CLINICAL STAFFING
IN THE INDIAN HEALTH SERVICE

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Clinical Staffing in IHS

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CHAPTER 1

EXECUTIVE SUMMARY: FINDINGS AND OPTIONS

One of the problems identified in the Office of Technology Assessment's (OTA's) April 1986 report, Indian Health Care, was the virtual termination of the National Health Service Corp's (NHSC's) scholarship programs, which have been a major source of physicians and other health care professionals for the Federal Indian Health Service (IHS). After 1988, the number of physicians who will be available to IHS from the NHSC will decline rapidly. For this reason, the Subcommittee on Health and the Environment of the Committee on Energy and Commerce, U.S. House of Representatives, requested that OTA: 1) identify current sources of health manpower for IHS and tribally operated programs; 2) review means of improving recruitment and retention of personnel from these sources; and 3) examine these activities and other methods for ensuring an adequate supply of health services to American Indians and Alaska Natives.

This chapter describes the nature and extent of IHS's clinical staffing problems, summarizes IHS's recruiting plans, and presents policy options for Congress and IHS to consider. The chapters that follow provide more detailed descriptions of IHS personnel planning and management systems (chapter 2); the IHS physician recruiting program and how it may be affected by external factors, such as the increasing supply of physicians nationally (chapter 3); the role of the NHSC in providing clinical staff to IHS (chapter 4); the role of the Public Health Service (PHS) Commissioned Corps in IHS (chapter 5); IHS's own health manpower training programs for Native Americans (chapter 6); and the special staffing problems of health programs managed by tribes under Public Law 93-638, the Indian Self-Determination and Education Assistance Act (chapter 7). For further details on the health of Native Americans and the Federal Indian health care system, the reader is referred to OTA's full assessment, Indian Health Care.

THE IHS HEALTH CARE DELIVERY SYSTEM

IHS is a bureau in the Health Resources and Services Administration (HRSA), Public Health Service (PHS), of the U.S. Department of Health and Human Services (DHHS). Since 1955, when the program was transferred to DHHS from the Department of the Interior (which manages other aspects of Indian affairs through its Bureau of Indian Affairs, BIA), IHS has been responsible for providing comprehensive health care to American Indians and Alaska Natives who are eligible for Federal services. In the 1980 U.S. Census, about 1.4 million individuals identified themselves as American Indians and Alaska Natives; of these, in 1980, IHS recognized an eligible service population of about 829,000. **In 1987, the IHS eligible service population is estimated at nearly 1 million (987,000).**

IHS is the largest direct provider of health care in the PHS. In addition, health services in IHS go beyond hospital and clinic medical services to include a wide range of social support services, environmental and sanitation programs, and facilities construction. The budget for IHS services delivery was approximately $810 million for fiscal years 1985 and 1986, and the appropriation for fiscal year 1987 (which may not necessarily be the final operating budget) is $858 million, including $16 million in new funding for drug abuse treatment programs. In addition to funds for service delivery, IHS receives separate annual appropriations for facilities construction and renovations, usually in the range of $50 to $60 million.

IHS provides services to Indians in 32 States through 12 geographically defined area/program offices (referred to in this report as IHS area offices), which have primarily administrative and support functions, and 125 service units within those 12 areas, which represent the facilities and programs that deliver services. IHS operates directly, or through contracts with tribal government organizations, a system of 51 hospitals and 124 full-service outpatient health centers. The Self-Determination and Education Assistance Act of 1975 is the basis for tribal management of services provided by IHS and BIA (chapter 7 describes this special aspect of Indian health delivery). The 40-bed average IHS hospital is much smaller than the typical U.S. community hospital of 177 beds; only 5 IHS hospitals have more than 100 beds, and only 13 of the 51 hospitals maintain surgical services.

In addition to the services provided directly by IHS and its tribal contractors, IHS administers a contract care program, which pays for services from private health providers when they are not available or accessible from IHS. For several years, the IHS contract care program has operated under budget constraints that have resulted in a rationing system based on determinations of medical urgency. In some IHS areas, contract care funding is so limited that only services for emergency and life-threatening conditions can be authorized. The severity of the rationing varies by IHS area, depending on the extent of IHS direct services available in the area and the level of contract care funding.

The IHS and tribal direct care system provided more than 400,000 days of inpatient care in 1984, compared with about 100,000 days of care purchased by the contract care program. Both IHS and contract inpatient days have been declining. Over 4 million ambulatory care visits were provided by IHS and tribal hospitals and clinics (1984), and an additional 218,000 visits were covered by contract care, which provides relatively little outpatient care because of its medical urgency priority system.

Overview of IHS Staffing

In its total workforce of approximately 10,400 (1985), IHS employs about 750 physicians, including physicians in administrative roles at IHS headquarters and area offices, nearly 2,000 professional nurses, 800 practical nurses, 300 pharmacists, and 275 dentists (see table 1). IHS staff may be hired through either of two personnel systems, the Federal civil service or the PHS Commissioned Corps. There are differences between the systems in terms of salary levels, benefits, and work conditions, which are described in chapters 2 and 5. The 1934 Indian preference law also affects personnel management in IHS and BIA.

Table 1 shows trends in IHS staffing, by professional category, from 1980 through the end of fiscal year 1985. Total full-time staff (i.e., individuals, not full-time equivalents)

Table 1.--IHS Full-Time Permanent Staff, by Professional Category, with Percent Indian, Fiscal Years 1980-1985

Professional Category	1980[1]		1981[2]		1982		1983		1984		1985	
	No.	Percent Indian	No.	Percent Indian	No.	Percent Indian	No.	Percent Indian	No.	Percent Indian	No.	Percent Indian
1. Professional (direct pt. care & support)	9,783	59.5%	7,709	53.8%	7,179	53.6%	7,335	54.5%	8,038	55.3%	7,944	55.1%
a. physicians	612	2.0	656	2.0	619	3.1	645	2.9	711	3.2	726	3.0
b. dentists	270	0.4	269	2.2	190	2.1	254	2.8	269	3.3	275	2.9
c. physicians asst.	85	100.0	84	78.6	78	83.3	81	85.2	83	86.7	83	12.0
d. grad. nurses	1,498	21.8	1,731	23.1	1,646	25.7	1,725	26.5	1,895	27.1	1,952	28.6
e. practical nurses	550	78.4	921	90.8	834	91.7	833	92.9	867	93.2	814	93.5
f. pharmacists	253	0.4	275	7.3	280	8.6	284	9.5	295	8.8	307	8.8
g. social workers	124	52.4	110	37.3	105	41.9	100	49.0	112	54.5	111	59.5
h. health educators, dietitians	138	22.5	122	34.4	132	31.1	100	14.0	107	17.8	109	24.8
i. medical clerks[3] & records staff	43	39.5	552	91.7	462	90.5	504	91.3	582	93.3	585	93.7
j. medical auxil.[3]	419	72.3	676	58.6	640	54.1	648	54.8	694	54.0	709	54.2
k. dental auxil.[3]	-	-	343	92.7	329	93.0	350	92.0	366	93.7	371	93.3
l. sanitarians	348	10.3	210	18.6	201	19.9	139	25.2	147	22.4	153	24.8
m. all others	5,443	82.9	1,760	83.2	1,663	81.5	1,672	84.1	1,910	84.6	1,749	86.8
2. Administrative (HQ and area offices)	1,461	66.1%	2,688	71.9%	2,321	71.3%	2,297	72.3%	2,304	73.6%	2,450	73.9%
IHS Total Staff	11,244	60.4%	10,397	58.5%	9,500	58.0%	9,632	58.7%	10,342	59.3%	10,394	59.5%

[1] Fiscal year 1980 data reflect staff as of December 31, 1979. As of August 1980, staff was 10,620 (57.6 percent Indian).

[2] For fiscal years 1981-85, data reflect staff as of September 30 of each year.

[3] Dental auxiliaries were not listed separately for fiscal year 1980 and are assumed to be included in "all others". In 1980, the "all others" category included medical clerks, records librarians and technicians, and medical technicians/auxiliaries categories, reported separately in subsequent years.

SOURCE: Adapted by OTA from U.S. DHHS, PHS, HRSA, IHS, "Annual Report to Congress on the Indian Civil Service Retirement Act, Public Law 96-135", for fiscal years 1980-85.

dropped from a high of 11,244 in fiscal year 1980 to a low of 9,500 in 1982, before increasing again to 10,394 in 1985. The number of IHS physicians increased from 612 in 1980 to 726 in 1985, and there also were gains in baccalaureate and practical nurses, pharmacists, and administrative support staff. Sanitarians showed the largest decline as a professional group. During that time, the percent of all IHS staff who were American Indians and Alaska Natives ranged from 58 percent to about 60 percent. Only 3 percent of IHS physicians and dentists were Indian, as were about 9 percent of the pharmacists and 12 percent of the physician assistants. Indians were most strongly represented among practical nurses (but not baccalaureate nurses), dental auxiliaries, medical records clerks, and administrative support staff.

The distribution of clinical and support staff among the 12 IHS areas, fiscal year 1984, is presented in table 2. (Total numbers of staff by professional category do not agree exactly with those in table 1, because of differences in the way clinical and administrative staff were counted in the two tables.) Numbers of Indian and non-Indian staff are identified. In 1984, the areas with the largest numbers of IHS staff were Oklahoma, Phoenix, Navajo, and Alaska, each of which employed between 1,200 and 1,600 individuals. The Aberdeen and Albuquerque IHS areas had about 915 staff each, the Billings area employed about 600, and the other IHS areas were smaller.

Tables 1 and 2 show reported IHS employees, including IHS civil service and Commissioned Corps staff assigned to health programs operated by the tribes under self-determination contracts, and former Federal staff employed by those tribal contractors. However, the tables do not include individuals hired directly by the tribal programs, and so do not reflect total staff providing health services to Indians. A special survey of 150 selected tribal programs in 1985 identified an additional 5,000 to 5,200 staff who were hired directly by the tribes and so were not counted in tables 1 and 2. Underreporting of total staff by area in table 2 is thought to be greatest in the California, Bemidji, and Nashville IHS areas, where substantial amounts of services are delivered under self-determination contracts. (Chapter 7

Table 2.—IHS Indian and Non-Indian Employees by Profession and Area, Fiscal Year 1984[1]

Profession	Aberdeen		Alaska		Albuquerque		Bemidji[2]		Billings		California[2]		Nashville[2]	
	Indian	Non-Indian	Indian	Non-Indian	Indian	Non-Indian	Indian	Non-Indian	Indian	Non-Indian	Indian	Non-Indian	Indian	Non-Indian
Medical officers	2	26	0	103	1	54	0	18	2	38	0	2	0	11
Dental officers	2	19	0	36	1	23	0	14	0	18	0	2	0	4
Physician assistants	8	2	5	3	10	2	0	0	1	0	0	0	1	0
Nurses	51	114	18	252	58	105	11	40	26	52	0	1	8	32
Other nursing	78	3	44	32	64	2	9	3	32	0	0	0	18	0
Clinical support	85	99	40	77	90	102	15	40	62	64	0	4	15	23
Administrative support	356	70	409	241	361	45	83	37	288	33	33	19	60	17
Area total	582	333	516	744	585	333	118	152	411	205	33	28	102	87

Profession	Navajo		Oklahoma		Phoenix		Portland		Tucson		Headquarters		IHS total	
	Indian	Non-Indian	Indian	Non-Indian	Indian	Non-Indian	Indian	Non-Indian	Indian	Non-Indian	Indian	Non-Indian	Indian	Non-Indian
Medical officers	4	145	8	89	1	117	1	27	1	15	3	21	23	666
Dental officers	1	44	1	45	2	24	2	16	0	3	0	12	9	260
Physician assistants	25	0	9	0	9	2	1	2	3	0	0	0	72	11
Nurses	116	281	106	217	89	237	16	24	6	20	9	6	514	1,381
Other nursing	240	5	125	3	163	7	5	2	17	0	13	2	808	59
Clinical support	230	123	181	156	108	66	41	57	10	12	9	24	886	847
Administrative support	727	92	600	65	556	165	144	50	58	9	149	139	3,824	982
Area total	1,343	690	1,030	575	928	618	210	178	95	59	183	204	6,136	4,206

[1] Forty-four medical officers and 29 dental officers serving in administrative capacities are included with clinical officers in this table. IHS employees of tribal contract programs assigned under IPAs and MOAs are included with other IHS staff in the total 6,136 Indian and 4,206 non-Indian employees. Staff hired directly by tribal contractors are not included.

[2] Total staffing figures probably are low in Bemidji, California, and Nashville, because staff hired directly by tribal contractors are not included.

SOURCE: Adapted by OTA from U.S. DHHS, PHS, HRSA, IHS, "Annual Report to Congress on the Indian Civil Service Retirement Act, Public Law 96-135, Fiscal Year 1984," table XII, 1985.

explains the effects of self-determination contracting and the procedures for assigning Federal civil service and Commissioned Corps staff to tribal programs.)

In addition to staff of IHS and tribally operated direct service programs, contract care programs in the IHS areas maintain a total of about 1,300 contracts with private providers, who are not counted as IHS staff.

Recent History of Manpower Recruiting by IHS

For many years, IHS has operated its own physician recruiting program. This program has never been large or well-staffed at the headquarters level, and it has relied on part-time IHS area office recruiters for additional support. The IHS recruiting program was able to meet most manpower needs in the past, thanks to the altruism of individual physicians and special circumstances. Until 1973, for example, physicians were subject to the military draft, and service as a PHS Commissioned Corps officer in IHS was an alternative to less desirable military placements. During the period of the doctor draft, IHS sources say there were two or three applicants for most IHS physician vacancies.

With the end of the doctor draft in 1973, IHS experienced a shortfall in recruiting physicians on a voluntary basis that gradually was filled in the late 1970s and 1980s by physicians from the NHSC. NHSC physicians are obligated to serve from 1 to 4 years in health manpower shortage areas, which include IHS sites, in order to pay back their medical scholarships. **The peak years of NHSC output were 1984 through 1986, when IHS received 130 to 150 NHSC physicians annually. This essential source of physicians will diminish rapidly after 1988, however, and there will be no physicians at all available from NHSC by 1992 unless current policies change.** Arguing that the growing surplus of physicians nationally will diffuse to underserved areas, thus eliminating the need for the NHSC, the Administration has sought to phase out the program by restricting new scholarship awards. **Recently, IHS has been able to recruit 40 to 50 voluntary physicians annually; but its ability to recruit enough volunteers to replace lost NHSC physicians has not been tested.**

The PHS Commissioned Corps, which has made valuable contributions to IHS professional staffing over the years, like the NHSC has been targeted by the current Administration for reduction or elimination. The Commissioned Corps experienced a substantial reduction following dismantling of the PHS hospital system in fiscal year 1982, and the Office of Management and Budget has sought to eliminate the Corps entirely on grounds that it is more expensive to operate than the Federal civil service. That attempt failed, following congressional hearings and a DHHS in-house study of the comparative costs of the civil service and Commissioned Corps personnel systems; but growth in the Corps has been limited.

STAFFING PROBLEMS IN IHS

Is IHS Staffing Adequate Now?

The adequacy of current IHS staffing levels is difficult to assess, because the standards and data necessary to do so are not readily available. There have been reports from time to time of critical staff shortages in particular IHS areas, and most observers probably would agree that IHS is understaffed overall. The extent of this understaffing is debatable, however, because IHS does not project the manpower distribution it ideally would need to service its eligible population. Contrary to what is widely believed, Resource Requirement Methodology criteria are not applied to overall manpower planning, but only to estimate the staffing needs of new and replacement facilities. **To determine recruiting needs, IHS headquarters compiles requests for staff from the 12 area offices, which decide their own preferred number and mix of clinical staff.** An analysis of IHS staff-to-workload ratios (excluding contract care) among the 12 IHS areas in 1984 showed wide variations (see chapter 2, table 5).

Various estimates of IHS manpower shortages have been suggested in recent years. The May 1986 draft IHS study, "Bridging the Gap", cited overall manpower shortages in the 10 to 15 percent range. In summer 1986, a group of IHS service unit directors judged their actual staffing to be about 20 percent less than what they needed. Recurring vacancies (many of which are lapsed positions due to budget constraints) sometimes are used as indicators of staff shortages, and usually fall between 1,100 and 1,500 positions, or roughly a 10 to 15 percent shortfall. About 7 percent of total IHS staff at year-end 1985 were not permanent employees, but were in "temporary intermittent" status, paid from Medicare and Medicaid collections.

Efforts to assess actual IHS staffing against outside standards are not particularly rewarding, because population-based standards of health care staffing, by profession, are either not available or too general. U.S. physician-to-population ratios provide only rough comparisons: In 1980, for example, there were 1.91 physicians per 1,000 U.S. population in metropolitan areas and 0.84 per 1,000 in nonmetropolitan areas, compared with 0.7 IHS physicians per 1,000 eligible Indians (IHS physicians do not include private providers in the contract care program). Patterns were similar for dentists. The quality review standards of the Joint Commission on the Accreditation of Hospitals cannot be used to evaluate IHS staffing, because they do not key manpower needs to service utilization levels. Important differences in the populations served by IHS and organized group practices such as health maintenance organizations (HMOs) mean that HMO manpower standards cannot be applied directly to IHS. HMOs vary considerably among themselves in terms of size, organization, and staffing patterns, and only the broad standard of one physician per 1,000 enrolled members seems to be widely accepted.

Given the standards summarized above, it is not possible to determine the appropriate number and distribution of staff, by type, needed to provide IHS services to eligible Indians. **A reasonable estimate is that current IHS staffing, overall, may be 10 to 20 percent short of what IHS believes it needs to operate its system.** This does not address the question of whether IHS services are adequate to meet the full range of Indian health care needs. The IHS workload represents an unknown level of underutilization, because services are not available and geographically accessible to all Indian populations, and because the contract care program is limited by its budget.

Immediate Problems in IHS Staffing

The present concern about clinical manpower in IHS is a consequence of changes in the NHSC, the Federal program that since the mid-1970s has provided medical scholarships in exchange for obligated service in health manpower shortage areas. **The future of the NHSC is critically important to IHS, because IHS is dependent on physicians from the NHSC to staff its programs.** As noted above, the NHSC has provided 130 to 150 of the 200 new physicians IHS estimates it needs each year to fill vacancies and accommodate growth in its service population. At least 60 percent of new physician recruits, and 45 percent of all physicians working in IHS, are completing their service payback obligations to the NHSC.

Since 1980, the Administration has sought to phase out the NHSC, on grounds that it is no longer needed because a surplus of physicians nationally will diffuse to provide services to underserved populations. A physician surplus was projected by DHHS's Graduate Medical Education National Advisory Committee (GMENAC) in 1980, and there now seems to be consensus that there is, or soon will be, an oversupply of physicians. Economic theory holds that if there is an oversupply of physicians in U.S. metropolitan and suburban areas, then in order to make a living new physicians will be driven to locate in increasingly rural communities and in less desirable inner city areas, thus eliminating the need for NHSC physicians to serve those populations.

While there is evidence of physician diffusion to rural communities, it is not clear that it will significantly affect medical services for Indians. Indian reservations are some of the most isolated and least desirable locations in the country, and in addition, it is not possible for private physicians to establish practices on Indian lands. Off-reservations locations would not necessarily be accessible to Indians. But more importantly, physicians would have to be employed by IHS (or authorized by the contract care program) in order for eligible Indians to use their services without charge. **Thus a national physician surplus will improve medical manpower and services for Indians only if it greatly increases recruiting of voluntary physicians into IHS, which does not seem likely in the near future, given the other organized practice alternatives available to physicians, the undesirability of many IHS sites, and uncompetitive IHS salaries and benefits.**

Congress has debated the need for continued Federal support for medical manpower training, and for the NHSC in particular, but the issues have not been resolved. The 99th Congress failed to reauthorize the NHSC field placement and scholarship programs, although funding was provided in continuing resolutions for the field placement program and a few financial hardship scholarships. Even had Congress reauthorized the NHSC, the numbers of new scholarships would have been much reduced from earlier levels.

Numbers of NHSC physicians expected to be available for service in future years fluctuate as scholars seek deferrals for additional post-graduate study, or move into or out of default status for a variety of reasons. Recent figures from the NHSC make it clear, however, that after 1988 very few physicians will be available, and IHS will be competing for them with community health centers, migrant centers, and other programs serving health manpower shortage areas. From 1984 to 1986, an average of about 1,200 NHSC physicians were available for placement each year; in 1987, an estimated 1,000 will be available. Only about 500 NHSC physicians will be available in 1988, after which there will be no more than a total of 320 physicians left in the NHSC pipeline (see table 9, chapter 4). **The Indian health manpower training programs authorized by the Indian Health Care Improvement Act (Public Law 94-437) may provide IHS with about 15 service-obligated physicians a year for a few years, but new scholarships in those programs also are being phased out.**

Recruiting adequate clinical staff for the tribally operated health programs sometimes is more difficult than recruiting for IHS facilities. The IHS physician recruiting and nursing services staffs will assist tribes in their recruiting when asked to do so. Some of the problems are due to the small size of many tribal programs, and the large number of different tribal programs makes it difficult for recruiters to know them well enough to describe to potential employees. The lack of data on present and future manpower needs in tribal programs complicates the matter. IHS now requires data reporting from the tribal programs that is more compatible with IHS data, but those efforts have not been completed. Finally, some tribal programs argue that their budget awards do not include sufficient indirect costs to permit them to offer reasonably competitive salaries and benefits in their recruiting efforts. Federal Tort Claims Act coverage does not at present extend to tribal employees who are not on assignment from the Federal Government, with the result that private malpractice insurance can be prohibitively expensive for tribally operated clinics and can deter physician recruiting. Congressional efforts to address the problems of indirect costs and liability coverage for tribal self-determination contractors were not successful in the 99th Congress.

Another IHS manpower problem that has not received as much attention as the imminent loss of NHSC physicians is the need for qualified nurses. **IHS nurse recruiters report that it is becoming more difficult, not less so, to recruit and retain adequate numbers of nurses for the IHS system.** About 650 nurses are needed each year to fill vacancies. It was anticipated that hospital staffing cutbacks due to implementation of Medicare's prospective payment system would result in more nurses being available to IHS. This has not been the case. Instead, the overall decline in nursing as a profession (for a number of reasons, including the wider range of careers now available to women, many of which pay better than nursing) has reduced the supply of nurses and made it more difficult for IHS to recruit the experienced baccalaureate nurses it seeks.

The IHS Response: Recruiting on a Voluntary Basis

Without the NHSC or some other source of service-obligated physicians, IHS will have to rely almost entirely on its ability to recruit physicians on a voluntary basis. **IHS states that its ultimate objective is to recruit and retain an all-volunteer professional staff, and it already is expanding its efforts to recruit voluntary physicians.**

During 1986, a special IHS task force worked to develop a physician recruiting strategy for the future. The resulting plan, a compilation of specific activities with estimated costs, received the full endorsement of the IHS Director in August 1986 (see chapter 3 for details on the IHS physician recruiting plan). The IHS Director allocated an additional $1.5 million of fiscal year 1987 funds to begin implementation of the recruiting plan, which raised the total recruiting program budget to nearly $4 million. No new staff positions were approved for the headquarters recruiting program.

The 1986 IHS recruiting plan projects a need for approximately 200 new physicians per year from 1987 through 1993 to fill vacancies and meet expanding manpower needs in IHS facilities and tribally operated programs. IHS reports that 40 to 50 voluntary physicians were recruited annually in the 1980s, with 47 recruited in 1985 and 52 recruited in 1986. Whether the expanded IHS recruiting program will succeed in increasing annual voluntary physician recruits from 50 to 200 remains to be seen.

Data on past IHS manpower recruiting needs and accomplishments were not available to support an independent assessment of IHS's projected need for 200 new physicians a year. As noted earlier, IHS bases its recruiting targets on staffing requests from the area offices, not on Resource Requirement Methodology criteria or other manpower planning methods. In spite of this lack of documentation, there is no reason not to accept 200 physicians a year as a realistic recruiting target: it represents the best estimate of IHS officials who are well-placed to know what actual needs are.

IHS recruiters believe that if they can recruit at least 160 to 175 of the 200 new physicians needed in each of the next few years, IHS should be able to maintain adequate staffing for its current system. This is a critical point, however, because if physicians are lost more rapidly than now is anticipated, and are not replaced, it could create extreme shortages that would cause remaining staff to leave, possibly forcing facility and program closures. As it is, IHS recruiters state that the 200-per-year target takes into account physician retention rates of only about 5 percent. This is based on the fact that, of NHSC physicians who have completed their 1 to 4 years of obligated service, only 5 percent work even 1 additional year for IHS; and of physicians recruited on a voluntary basis, only 5 percent continue with IHS after completing their initial 2-year assignment. With retention rates as low as these, IHS must plan to replace a quarter to one-third of its total physician workforce each year.

If 200 new physicians a year is a reasonable recruiting target, will IHS be able to meet it? Given that in 1986 the IHS recruiting program hired 52 physicians on a voluntary basis, the prospects for recruiting 200 are doubtful. Even if the new recruiting plan is fully funded and implemented (funding for the complete package, new and continuing activities, is estimated at $4 million for fiscal year 1987), there is no guarantee of success. The most promising of the new recruiting strategies, which is budgeted at about $860,000 of the $1.5 million special allocation, is the program to support physicians in 20 family practice and 5 other specialty residencies. The immediate effect of this program, however, is more likely to be increased retention of existing IHS staff than recruitment of new physicians, because the residencies will be awarded by preference to physicians already employed by IHS.

The 1986 recruiting plan does not address the major disincentive to IHS employment, which is low physician salaries that are not competitive with those offered by other providers. IHS can pay about $45,000 to hire a new 3-year resident physician. The salaries offered by other providers vary with the physician specialty and the practice location, but are more likely to be in the $60,000 to $100,000 range. In addition, while private employers can offer whatever salaries are necessary to attract physicians, IHS does not have that flexibility because it must conform to civil service or Commissioned Corps salary and benefits rules. The special benefits that IHS can offer as an organized practice, such as malpractice coverage, can be matched and exceeded by other groups. IHS recruiters have observed that, in earlier years, IHS was attractive to some physicians because it was one of relatively few organized practice options; but with the recent rapid growth of health maintenance organizations, preferred provider groups, and other variations on organized group practice, IHS faces increasingly stiff competition from the likes of Kaiser Permanente and Humana.

The obstacles to voluntary staffing of the full IHS system are considerable. There are organizational disincentives, including the small, limited-service hospitals, sometimes inadequate equipment and support staff, and shortages of professional staff that can lead to overwork and heavy on-call schedules. Indian preference may limit upward career mobility for non-Indians in some professions, such as nursing, although it has not had a significant effect on physician staffing because there are few Indian physicians. The extreme geographic isolation of some IHS sites is associated with the lack of satisfactory housing, schools, and public and commercial services. Finally, as described above, the salaries and fringe benefits IHS offers usually are not competitive with private providers.

The IHS physician recruiting program itself is at a disadvantage in competing with private sector recruiters, who have much larger recruiting budgets. It is estimated, for example, that private recruiters may spend $20,000 to $30,000 per physician recruited, while IHS expenditures are on the order of $12,000 per physician recruit. IHS and the NHSC are not allowed to pay travel expenses for the spouses of physicians who visit their sites, a restriction that, according to the HRSA contracting office, would require legislation to overcome. The IHS recruiting program also needs an automated data system to link the 12 IHS areas and headquarters in tracking manpower needs and recruiting activities. On the positive side, IHS can hire physicians either through the Federal civil service or the PHS Commissioned Corps, whose benefits (including the option of retirement after 20 years of service) are attractive to many physicians, especially those in the military who can transfer their benefits directly to the Commissioned Corps. IHS employees need not make the investment required to establish a private practice, and protection from malpractice liability is provided under the Federal Tort Claims Act. Finally, the opportunity to provide needed services in a comprehensive family practice setting attracts some physicians to IHS.

Will the Physician Surplus Increase IHS Recruiting?

The potential for increased recruiting of voluntary physicians by IHS as a result of the national surplus of physicians deserves further discussion, because it often is cited to justify phasing out Federal medical manpower programs such as the NHSC. Although a substantial surplus of physicians is expected in the U.S. in the 1990s, there is not as yet a clear consensus on the extent to which this surplus will drive new physicians to locate in underserved communities (see chapter 3 for a review of the literature on this subject).

A recent major study of the locations chosen by physicians who had completed their NHSC placements in underserved areas (but not necessarily in IHS sites) found that a notable proportion of them chose to remain in non-metropolitan areas. They did, however, select areas (counties in this study) that were of higher population density, closer to metropolitan and suburban areas, and therefore more desirable to the physicians and their families in terms of social, cultural, and educational benefits. This study suggested that if physicians continue to disperse from U.S. metropolitan areas, that dispersion will emanate gradually outward from the more desirable areas. A countervailing factor, however, may be the present difficulties and predicted closures of many small rural hospitals in coming years, as a consequence of the Medicare prospective payment system and similar cost containment efforts in the private sector. Communities without hospitals are less likely to attract physicians.

Indian communities nearest to metropolitan and suburban areas may benefit along with other such communities from the surplus of physicians, but these represent few of IHS's sites. There will continue to be counties in the United States that simply do not have the population or the existing health facilities to support physicians. In its efforts to recruit physicians and nurses for sites that are among the most geographically and socially isolated in the country, IHS cannot expect the surplus of physicians to solve its staffing problems. Increased competition among physicians for practice locations may in fact benefit many rural communities, but IHS does not have the means to compete with those communities for the interested physicians. IHS cannot offer competitive salaries, and the whole range of benefits, facilities, and living conditions are less desirable in IHS employment than elsewhere.

One approach to recruiting health professionals to isolated rural areas holds that individuals who grow up in rural areas are more likely than others to return to them. Indians from reservations, therefore, might be more likely to return to serve reservation Indians than non-Indians of any background. A recent study of the U.S. medical school class of 1975 found that minority physicians of that class now provide more care to patients of their own racial or ethnic groups and to Medicaid patients than do their nonminority counterparts. That study, however, did not deal specifically with the current practice locations of minority medical students from isolated rural backgrounds or from Indian reservations.

There are perhaps 600 American Indian and Alaska Native physicians in the United States, and approximately 130 members in the Association of American Indian Physicians; but only about 20 Indian physicians are employed by IHS. Programs to recruit and train Indians in a range of health professions have been operated in IHS since 1974 under the authority of the Indian Health Care Improvement Act (Public Law 93-437). The specific programs, which focus primarily on non-physician health professionals, are described in chapter 6 of this report. The Indian health manpower training programs are too small to have a significant effect on IHS's immediate and long-term clinical staffing needs. The Administration is seeking to phase them out, and they are not strongly supported in DHHS.

Consequences of Insufficient Physician Recruiting

If the IHS voluntary physician recruiting program is unable to meet its target of hiring 200 new physicians a year -- that is, replacing one-fourth to one-third of its total physician workforce annually -- it is clear that IHS could experience serious physician shortages in the near future. These manpower shortages would severely limit IHS's ability to deliver health care to American Indians and Alaska Natives.

Too many unknown variables are involved in the IHS physician recruiting situation to allow exact prediction of the timing and severity of potential losses. IHS recruiters have stated that IHS probably could maintain existing levels of services for a few years by recruiting a minimum of 160 to 175 new physicians annually. In rough terms, however, if IHS needs to replace 200 of its more than 600 physicians a year, and only recruits 100 a year, it would require only 6 years to eliminate a workforce of 600 physicians. It is likely that a core of IHS physicians would remain, and losses would slow before this scenario was completed. On the other hand, it is possible that early physician losses could precipitate a more rapid deterioration, because workloads would become unbearable.

If IHS begins to suffer a net loss of physicians, it probably will take steps to preserve its service delivery capability as long as possible. The first effects of inadequate physician staffing might be reductions in existing programs and elimination of physician involvement in health-related programs. IHS could use physician assistants or nurse practitioners in place of some physicians. Simple substitution is not always possible, however, because physician assistants perform a more limited range of services than physicians and require physician supervision. After service reductions, entire programs might be eliminated and facilities closed.

IHS would have to rely more heavily on its contract care program to purchase services from the private sector, but it is doubtful that contract care could replace all services now available and accessible to eligible Indians from IHS. In some IHS locations, few if any private providers exist. It also might be more costly to purchase services from private providers, and even with reprogramming of direct delivery funds into contract care, there still would be budgetary limits on services. Finally, if the IHS direct delivery system were reduced and the contract care budget exhausted, Indians without private health insurance (the large majority of reservation Indians) would have no choice but to turn from the IHS system to any other available resources, beginning with the Medicare and Medicaid programs, and including State, county, and local programs for the medically indigent. This increased use of other public resources would intensify the strain those programs already are under from growing uninsured populations, and in areas where health care for Indians traditionally has been provided by IHS, Indians might be denied services.

OPTIONS FOR ENSURING ADEQUATE STAFF IN IHS

IHS is dependent on the NHSC for service-obligated physicians to staff its facilities and programs. After 1988, very few new NHSC physicians will be available, and there will be none in the 1990s. IHS is responding to the imminent loss of NHSC physicians by expanding its efforts to recruit physicians on a voluntary basis. A comprehensive recruiting plan has been adopted and additional funds allocated to physician recruiting in 1987. The ability of IHS to recruit the 200 new voluntary physicians it needs each year, however, instead of the annual maximum 52 it has recruited in the past, is doubtful. And because current IHS staffing may be 10 to 20 percent short of desirable levels overall, the loss of physicians and nurses could be felt immediately in reduced health services for eligible Indians.

Reliance solely upon IHS's ability to recruit more voluntary physicians does not appear to be an adequate response. Given the many factors that could affect IHS manpower recruiting and retention, it seems reasonable for Congress and IHS to pursue a variety of strategies that could ease the situation. The following sections suggest some of the actions Congress and IHS could consider in their plans to ensure health care services for American Indian and Alaska Native peoples.

What Can IHS Do About Its Staffing Problems?

In addition to intensifying its voluntary recruiting efforts, in cooperation with the NHSC, IHS could take steps internally to manage its staff as effectively as possible. Even a modest improvement in IHS's poor physician retention rate could reduce the severity of future manpower problems. IHS could assist tribally operated health programs in their manpower recruiting efforts and work with them on the problems of indirect costs and malpractice insurance.

IHS could expand its efforts to recruit clinical staff on a voluntary basis.

Option 1: Implement the IHS voluntary physician recruiting plan as aggressively as possible.

IHS has adopted a comprehensive plan for increased physician recruiting on a voluntary basis, and could begin to implement these activities immediately. The recruiting program could rely on recruiting staff and resources in the IHS area offices to supplement the limited budget and staff positions at headquarters, and an automated data system to link area and headquarters recruiting offices would support this coordinated approach. The new out-of-service residency program, which is a major initiative of the physician recruiting strategy, may prove a strong incentive to improved retention of IHS physicians who will have preference for the 25 residencies available in 1987. If IHS can offer enough residencies to make them available to new physician recruits before or relatively early in their IHS careers, the program could be a valuable asset to voluntary recruiting as well.

Option 2: Cooperate with the NHSC in recruiting voluntary physicians.

The IHS recruiting program can continue to share an 800 telephone number with the NHSC to screen initial inquiries, cooperate in advertising campaigns, and reduce travel costs by coordinating site visits. Linkage with the NHSC data system might be considered as an alternative or addition to a separate IHS recruiting data system. IHS recruiting officials at headquarters have initiated regular staff meetings with the NHSC to improve communications. Cooperation between IHS and the NHSC could assist in the effective placement of the NHSC's last obligated scholarship recipients, and in implementation of a new loan repayment program, if one is authorized by Congress.

Option 3: Increase recruiting of clinical support staff, especially qualified nurses.

IHS recruiting plans focus on the anticipated loss of NHSC physicians, but efforts to increase recruiting of support staff, especially qualified nurses, should not be neglected. In some IHS areas (Navajo, Aberdeen), nurse staffing already is a major problem. Inadequate nursing staff can discourage the recruitment of physicians and other professionals and reduce service delivery capabilities. In developing and implementing physician recruiting strategies, IHS could design those activities to include nurses and other health professionals as necessary.

Option 4: Administer the Indian health manpower training programs to place graduates in IHS facilities.

Although continuation and expansion of the Indian health manpower training programs of Title I of the Indian Health Care Improvement Act depend on congressional action, IHS has administered these programs in the past and will resume administration in 1987 (following temporary management by the NHSC in 1986) for as long as there are students in the system. The large majority of these students are American Indians and Alaska Natives. Presumably, all of the medical students (and possibly some of the nurses) owe payback service in IHS. It was estimated that up to 300 nurses and 80 medical students remained in these programs in 1986, and IHS could maintain contact with the students to ensure their placement after training in IHS facilities and programs.

IHS could use its present clinical staff as effectively as possible.

Option 5: Redistribute available staff and develop contingency plans for potential staff reductions.

During the transition from dependence on obligated NHSC physicians to increased recruiting of voluntary physicians, IHS is likely to experience at least a temporary loss of medical manpower. Therefore, IHS could benefit from a thorough review of its current staffing patterns, followed by appropriate adjustments and contingency planning. Although preliminary analyses of staff-to-workload ratios among the 12 IHS areas and comparisons of IHS hospital staffing with U.S. community hospitals of similar bed size are not conclusive (see chapter 2 for details), they do point out enough unexplained differences among the areas and between IHS and U.S. hospitals to warrant further study.

IHS could begin to develop and debate contingency plans for use in the event that clinical staffing deteriorates seriously. The objective of this "disaster planning" could be to maintain service delivery capabilities to the extent possible, given progressive levels of staff reductions. IHS could prepare for expanded use of its contract care program by improving management efficiency, authorization procedures, and claims processing. Finally, IHS could increase efforts to educate its beneficiaries about the need to use all other sources of care or payment for which they may be eligible, such as Medicare, Medicaid, and private insurance, whenever this is practical.

Option 6: Improve retention of IHS staff.

Even minor improvements in IHS staff retention could ease substantially the burden on voluntary recruiting efforts. Retention of IHS staff depends on a wide range of factors, including salary and benefits, working conditions (the adequacy of facilities, equipment, and support staff, employee and patient security, and on-call hours), and living conditions in the Indian community. The ability of IHS to improve some of these conditions is limited by budget constraints; but the Indian communities themselves can make important contributions to improving staff retention by welcoming and supporting their IHS employees.

Option 7: Strengthen IHS personnel management authorities.

If supported by DHHS, IHS could take steps to improve its personnel management. The Director of IHS now has the authority to make personnel management decisions and to delegate them to the IHS area offices. The actual administration of personnel actions, however, is fragmented between HRSA and the Federal Regional Personnel Offices, and this problem could be addressed. Indian preference, which applies to all IHS personnel actions intended to fill a vacancy, is another aspect of personnel management worthy of further study.

Option 8: Assist tribal health programs in meeting their staffing needs.

IHS physician and nurse recruiters could provide more assistance to tribally operated health programs; but to do so, they need information to adequately describe the programs. Efforts to include these programs in IHS data systems could be intensified.

IHS needs to continue working with the tribal programs to resolve problems with the adequacy of their indirect costs and, in particular, their ability to purchase liability insurance for tribal employees who are not on assignment from the Federal Government (see chapter 7 for a discussion of these issues). Special studies to determine the actual range of additional administrative costs that tribes encounter in managing their programs would be helpful. IHS could authorize a limited number of Commissioned Corps assignments to California tribal health programs, perhaps on a demonstration basis, to relieve their related problems of staffing and malpractice coverage.

Option 9: Increase use of the PHS Commissioned Corps.

IHS could plan to use its PHS Commissioned Corps officers to compensate for clinical manpower shortages. Commissioned Corps physicians and other health professionals could be used as a mobile force to fill critical vacancies and provide essential services. In addition, IHS could request PHS to reassign Commissioned Corps officers from other PHS agencies to IHS. This could be an important source of emergency staff for IHS.

What Can Congress Do About IHS Staffing?

Congress has not been successful in passing Indian health legislation since President Reagan vetoed reauthorization of the Indian Health Care Improvement Act in October 1984. Efforts to reauthorize the Act failed in the 99th Congress, as did continuation of the NHSC field placement and scholarship programs and amendments relating to Indian self-determination contracting. Congress did succeed in protecting Indian health services from the full effects of the Gramm-Rudman-Hollings deficit reduction act. In addition to supporting IHS efforts to recruit more clinical staff on a voluntary basis, Congress could consider means of ensuring a continuing supply of obligated health providers to staff the IHS system.

Congress could support IHS voluntary physician recruiting activities.

Option 10: Ensure adequate resources for the IHS physician recruiting program.

In reviewing the IHS budget for 1987 and budget requests for 1988 and future years, Congress could monitor funding levels for IHS health manpower recruiting efforts and earmark appropriations as necessary to ensure adequate resources. The number of professional staff devoted to IHS manpower recruiting is limited and might merit expansion both at headquarters and in the IHS area offices. An automated data system to link area and headquarters recruiters (and including data on tribal health programs) also is needed.

Option 11: Authorize reimbursement for spouse travel on site selection visits.

IHS physician recruiters report that their inability to reimburse travel expenses for the spouses of prospective recruits, when those candidates visit several IHS or NHSC sites to select a location, reduces recruiting success. The NHSC and IHS paid these travel expenses until a few years ago, when the HRSA contracting office determined they did not have the authority to do so. For this reason, specific congressional authorization is necessary to allow spouse travel reimbursements. The change would be relatively inexpensive, estimated by the 1986 IHS recruiting task force at between $150,000 and $200,000 a year.

Option 12: Ease the staffing problems of tribal health programs.

Manpower recruiting by some tribal health programs may be hindered by the contractors' limited ability to purchase fringe benefits and malpractice insurance, due to restricted budgets. Congress could reconsider H.R. 4174, which passed the House in 1986 but failed in the Senate, to guarantee a certain level of contract support (indirect) costs. Extension of the Federal Tort Claims Act to provide malpractice coverage for the non-Federal staff of tribal contractors also might be reconsidered, with coverage limited to those employees who carry out approved IHS contract functions, rather than all tribal employees. Congressional action on these matters, however, has been complicated by the lack of reliable data on the tribal programs and their staff.

Option 13: Increase IHS physician salaries and permit bonuses for hard-to-fill locations.

IHS physician salaries, whether in the civil service or the Commissioned Corps, are not competitive with those in the private sector. Although any proposal to increase IHS physician salaries might be dismissed because it would entail additional costs, Congress might nonetheless compare the costs of a revised salary plan (with appropriate limits on overtime pay, and possible incentives for clinical rather than administrative service) with those of special programs, such as the NHSC scholarship program or a loan repayment program, for the purpose of improving IHS staff recruitment and retention. Congress could direct PHS to use a special 6 percent bonus that already is authorized to motivate physicians to accept hard-to-fill IHS assignments.

Congress could ensure the availability of service-obligated physicians and other health providers.

Option 14: Reauthorize the NHSC scholarship program.

Enabling legislation for the NHSC has not been reauthorized since 1984, although the field placement and scholarship programs have operated under continuing resolution appropriations. In order to reactivate the NHSC as a source of obligated physicians, the program would have to resume new scholarship awards to medical students who would become available for service 3 to 7 years in the future.

Senate bill S. 1285, which passed in July 1985 (companion legislation failed in the House in 1986), authorized $70 million for the NHSC field program in fiscal 1986, $65 million in 1987, and $60 million in 1988. In addition, it authorized "such sums as necessary" for 150 new scholarships annually plus continuation awards. According to the NHSC, when the scholarship program budget was $2.3 million in 1985, only 49 students received new or continuation scholarships. On that basis, to grant and administer 150 new scholarships plus 50 continuations would cost roughly $9 to $10 million in the first year; but funding for an additional 150 continuations would be required each year thereafter (i.e., an added $6 to $7 million annually until students graduated).

Continuation of the NHSC as a source of obligated physicians would be relatively expensive and therefore difficult to justify in the context of physician surpluses and Federal deficit reduction objectives. The Office of Management and Budget and the Administration oppose reauthorization of the NHSC for these reasons. The NHSC supports students from medical school through residency training, up to 7 or 8 years: therefore, even if the scholarship program were reauthorized for fiscal year 1988, it would not produce obligated physicians until 1994 or 1995, long after staffing would have become critical in IHS.

Option 15: Authorize and fund a new loan repayment program in the NHSC.

A second alternative for ensuring a supply of physicians and other health professionals who are obligated to serve in health manpower shortage areas is a loan repayment program. Such a program was authorized in the late 1970s until 1982, but was never well-funded, perhaps because it competed with an active NHSC during that period. PHS advocates loan repayment to replace the NHSC scholarship program as a means of providing the minimum numbers of obligated physicians needed to fill positions in IHS, Federal prisons, and some community health centers and migrant clinics.

A loan repayment strategy makes sense; instead of investing in years of medical education for physicians who may turn out to be too specialized or unwilling to provide primary care to underserved populations, a loan repayment program would enable PHS to selectively contract with post-residency physicians in the appropriate numbers and specialties to meet actual manpower needs at the time. Unlike the NHSC scholarship program, a loan repayment program could provide health professionals quickly to help fill IHS vacancies in 1988 and thereafter. A reduced default rate (now estimated in the range of 10 to 15 percent in NHSC, compared with about 3 percent for medical students with Federal Health Education Assistance Loans) is seen as a major advantage of loan repayment over NHSC scholarships. In 1984, the American Medical Association, the American Medical Student Association, and the Association of American Medical Colleges supported renewal of the loan repayment option.

Such a program would require new legislation and funding, but it could well be less costly and more effective than continuation of the NHSC scholarships. PHS supports a program that would permit it to contract with second- and third-year medical residents who agree to work a minimum 2-year assignment in a location designated by PHS, in exchange for PHS assumption of educational debts at the rate of $15,000 in debt per year of obligated service. The program most likely would be administered by the NHSC. PHS estimates that the first year of the loan repayment program would require $6 to $8 million in addition to NHSC administrative/field placement program funding.

Although the Administration's fiscal year 1988 DHHS budget proposal does not include a PHS loan repayment program, many in PHS believe that it would be a better solution to physician staffing problems than renewed NHSC scholarships. Neither the 1985 Senate bill (S. 1285) nor the House version of the NHSC reauthorization (H.R. 2237), which failed primarily because it called for an average 400 new NHSC scholarships per year, provided for the type of loan repayment program described here. If a loan repayment program were considered separately from the NHSC scholarships issue, it might be more likely to win congressional approval and Administration support.

Option 16: Reauthorize and expand the Indian health manpower training programs.

The Indian Health Care Improvement Act of 1976 (Public Law 94-437) established several health manpower training programs for Indians, including the health professions scholarship program (section 338-G of the Public Health Service Act) that requires payback service in IHS. Funding for these programs has not exceeded $6 million per year, the Administration has sought to eliminate them by prohibiting new scholarship awards, and Congress has not succeeded in reauthorizing the Indian Health Care Improvement Act since the 1984 veto. Although the programs have not trained enough health professionals to significantly affect IHS manpower needs, there still are an estimated 300 nurses in the system and perhaps 80 medical students, most of whom are Indian. These medical students would be obligated to serve in IHS upon completion of their training, and because they are Indian, might be more likely than other physicians to make a career in IHS. IHS recruiters also report that the extern program (section 105 of Public Law 94-437), which provides employment in IHS facilities and programs during nonacademic periods for students in the health professions, is a productive recruiting tool. The 100th Congress could ensure maintenance of the most useful of these manpower training programs and the graduation of as many medical students as possible into IHS service by action to reauthorize and fund Title I the Indian Health Care

Improvement Act.

Option 17: Authorize expansion of the new IHS physician residency program.

Half of the $1.5 million in special funding to implement the IHS physician recruiting plan in 1987 will be spent to support 25 physicians in family practice and other residencies. The residency awards will entail service payback in IHS at the rate of 2 months of service for each month of support. In the first year of this new program, the residencies will be awarded by preference to physicians already employed by IHS. The response has been strong: by December 1986, 18 IHS physicians had applied. Thus, the program initially will contribute more to physician retention than to recruiting new staff, but in either case it will be valuable to IHS. If the program of 25 residencies is successful, it might merit expansion; and if it were to be expanded substantially, congressional approval would be required. Congress could monitor the potential of this new program as one source, among others, of physicians with service obligations in IHS.

Option 18: Authorize reassignment of Commissioned Corps officers from other PHS agencies to IHS.

The PHS Commissioned Corps is a career service of health professionals that provides staff to IHS and other programs in HRSA, and to other PHS agencies including the National Institutes of Health, the Centers for Disease Control, the Food and Drug Administration, and the Alcohol, Drug Abuse and Mental Health Administration. The PHS Commissioned Corps is a mobile force whose officers are subject to reassignment to meet public health needs and emergencies. If clinical staffing should become critically short in IHS, Commissioned Corps officers from other agencies could be reassigned to meet that emergency. If such a need arises, Congress could expedite the response by providing direction and necessary budget adjustments.

CHAPTER 2

PERSONNEL PLANNING AND MANAGEMENT IN THE INDIAN HEALTH SERVICE

This chapter briefly describes the Indian Health Service's (IHS's) personnel management systems, along with some of the particular circumstances that affect personnel management in IHS. Methods for determining IHS health manpower needs are compared with those used by other delivery systems, such as health maintenance organizations.

IHS PERSONNEL MANAGEMENT SYSTEMS

Many Indian organizations and IHS officials believe IHS needs greater control over its personnel systems. Although the Director of IHS is responsible for between 10,000 and 11,000 employees, his lines of authority for personnel management and administration in IHS headquarters and area offices are fragmented. There is no personnel office in IHS headquarters: instead, headquarters personnel actions are handled by the IHS headquarters operations branch in the Health Resources and Services Administration (HRSA); and actions for the IHS area offices are processed through Federal Regional Personnel Offices (RPOs). The proposal to elevate IHS to Public Health Service (PHS) agency status, included in bills to reauthorize the Indian Health Care Improvement Act (Public Law 94-437) in the 99th Congress, was one approach to alleviating perceived personnel management difficulties (the Senate bill introduced in the 100th Congress does not contain this provision). Alternatively, PHS internal management changes could help to ease this problem.

Until 1980, each IHS area office managed its own personnel functions more or less autonomously. This resulted in inconsistent policies, especially in the application of Indian preference. As part of a general Department of Health and Human Services (DHHS) personnel servicing reorganization, between 1978 and 1980 authority and responsibility for personnel services for IHS field employees were transferred to the RPOs. This reorganization provided the framework for more consistent policy implementation, although some problems have remained, in part due to high turnover in personnel office staff.

The personnel systems that resulted from this reorganization were described in a memorandum from the IHS Director to IHS area office staff in November 1983. Three major personnel authorities were affected: 1) the personnel management authorities (i.e., the ability to hire, fire, promote, discipline, etc.) for all IHS area employees except area personnel office employees; 2) the same personnel management authority for area personnel office employees; and 3) personnel administration authority (i.e., the regulatory authority to process personnel actions) (103).

The distinction between personnel management and personnel administration authorities is important. Personnel management authorities, as defined above, were not affected by the personnel servicing reorganization and (except for area personnel office staff) continued to flow from the Secretary of DHHS to the Assistant Secretary for Personnel Administration (ASPER), and from ASPER through line management channels (ASPER-PHS-HRSA-IHS) to IHS managers. The RPOs have no personnel management authority, only personnel administration authority, which is the ability to authorize that personnel actions meet all applicable legal, regulatory, and policy requirements.

Personnel administration authority also is delegated from ASPER, but within IHS it follows two separate tracks. ASPER delegates administrative authority for personnel actions affecting IHS headquarters staff (including the Albuquerque West support office) through PHS to HRSA. Personnel administration authority for actions affecting all IHS field staff is delegated from ASPER to the RPOs. The RPOs redelegate this authority to IHS area directors, who redelegate to area personnel officers; these relationships are formalized in Memorandums of Agreement. (Personnel management and administration authorities for area personnel office staff are delegated separately, so that the RPOs retain technical and administrative control over personnel operations.)

The role of the IHS Director in this system is to determine IHS personnel objectives, establish IHS personnel management policies (consistent with the policies of HRSA, PHS, and DHHS), and redelegate personnel management authority within IHS. The November 1983 memorandum identified an IHS headquarters management focal point to coordinate personnel issues and the roles of the several participating offices (ASPER, RPOs, PHS, HRSA, IHS headquarters, and IHS area offices). In summary, while the IHS Director retains authority for personnel management decisions affecting all IHS headquarters and field staff (except the area personnel office staff), personnel administration authority is exercised by HRSA for IHS headquarters personnel actions and by Federal RPOs for IHS field employees. The result is a fragmentation of IHS authority to determine and implement its personnel policies (103,13,32,33).

Other special factors affect personnel management in IHS, including: 1) the use of two different personnel systems, the Federal civil service and the PHS Commissioned Corps; 2) the need to apply Indian preference in filling all vacancies; and 3) the special requirements for transferring Federal employees to health programs operated by the tribes under self-determination contracts.

Numbers of civil service and Commissioned Corps employees in IHS are shown in table 3 for 1980 through the end of fiscal year 1985. Of the total 10,620 employees in August 1980, 1,909 individuals (18 percent) were members of the PHS Commissioned Corps. That proportion increased to about 20 percent in 1985. What this table does not show is that Corps officers represent a much higher proportion of IHS clinical staff than their 20 percent share of the total staff. For that reason, the Commissioned Corps is particularly important to IHS operations, although many more IHS employees are in the Federal civil service (the role of the Commissioned Corps in IHS is described in chapter 5). The majority of IHS's civil service employees, more than 70 percent, are Indian, compared with only 7.5 percent of Commissioned Corps officers (1985). Table 3 shows that only two IHS employees are in the highest grades of the civil service, the Senior Executive Service.

The effects of Indian preference on personnel management in IHS, and on the

Table 3.--IHS Full-Time Permanent Staff, by Pay Plan, with Percent Indian, Fiscal Years 1980-1985

Pay Plan	1980[1]		1981		1982		1983		1984		1985	
	No.	Percent Indian	No.	Percent Indian	No.	Percent Indian	No.	Percent Indian	No.	Percent Indian	No.	Percent Indian
PHS Commissioned Corps	1,909	3.2%	1,917	5.4%	1,888	5.8%	1,934	6.6%	2,063	7.2%	2,124	7.5%
Civil Service Total	8,711	69.6	8,480	70.4	7,612	70.9	7,698	71.8	8,279	72.3	8,270	72.9
Senior Executive Service (Exec. Schedule)	1	100.0	1	100.0	1	100.0	1	100.0	1	100.0	2	100.0
Merit Pay System	-	-	-	-	266	40.2	266	41.0	277	44.4	289	49.1
General Schedule	7,261	65.8	7,162	66.7	6,153	68.2	6,227	69.2	6,695	69.4	6,715	69.9
Wage Board (Non-supervisory Federal Wage System, Wage Leader, Wage Supervisory)	1,410	89.3	1,303	90.6	1,192	91.6%	1,204	92.4%	1,306	93.3%	1,264	94.0%
(Administratively Determined Rate)	31	74.2	6	66.7	-	-	-	-	-	-	-	-
(Youth Worker)	-	-	2	100.0	-	-	-	-	-	-	-	-
(Unknown)	8	12.5%	6	33.3%	-	-	-	-	-	-	-	-
IHS Total Staff	10,620	57.6%	10,397	58.5%	9,500	58.0%	9,632	58.7%	10,342	59.3%	10,394	59.5%

[1] Fiscal year 1980 data reflect staff as of August 31, 1980; subsequent years are as of September 30.

SOURCE: Adapted by OTA from U.S. DHHS, PHS, HRSA, IHS, "Annual Report to Congress on the Indian Civil Service Retirement Act, Public Law 96-135," fiscal years 1980-1985. Note different pay plan categories in earlier years; but categories are consistent for 1982-85.

recruitment and retention of clinical staff, are controversial subjects. IHS recently conducted an in-house study of Indian preference, which included a survey of attitudes about it; but those results were not available to this study (14). Based on legislation of 1934, Indian preference applies to all personnel actions intended to fill a vacancy in the Bureau of Indian Affairs (BIA) and IHS. Indian preference in IHS was applied only to initial hiring decisions (similar to the application of Veterans' preference) until the 1970s, when DHHS General Counsel opinion and a lawsuit established the principle of absolute Indian preference.

A few exceptions to absolute Indian preference were specified in amendments of 1980; however, they affect near-emergency situations, such as Federal Reductions in Force, danger to patient or employee health and safety, or complete failure of relations with local tribes (12). Indian preference also is somewhat less restrictive as it applies to employees of IHS contractors, including Buy Indian and tribal self-determination contractors. Indian preference for contractors derives from general contracting provisions, rather than the specific Indian preference regulations that affect IHS and BIA, and it applies only to employees hired to carry out the contract. The language permits tribes to hire non-Indians after qualified Indian candidates have been considered.

Positions in IHS are open to candidates from both the civil service and the Commissioned Corps; but when members of the two systems compete for the same vacancy, an Indian candidate (if there is one) will be selected in preference to a non-Indian, regardless of the personnel system. Indian preference also supercedes Equal Employment Opportunity rules.

Some IHS and HRSA officials believe Indian preference has made personnel management more difficult, because it has reduced overall mobility in the system. Non-Indians are limited in their upward career mobility; and when they cannot be promoted or transferred geographically, they may block opportunities for Indians and non-Indians below them. Indian preference is said not to be a significant deterrent to the recruitment of non-Indian physicians, because there are few Indian physicians to compete with them. In the field of nursing, however, where about 30 percent of IHS R.N.s and nearly 100 percent of L.P.N.s are Indian, Indian preference is becoming a serious disincentive to the recruitment and retention of non-Indian nurses (12,32,64). At present, there is no hard information on the positive and negative effects of Indian preference in IHS. A thorough review of its implementation and effects, therefore, would be a useful basis for further discussions.

A review of IHS area office operations, reported to the IHS Director in 1984, touched on some of these personnel issues (104). Progress has been made in promoting more consistent functional organizations in the area offices and headquarters. A recommendation that IHS study the feasibility of regionalizing certain support services, which might include personnel management, was not well received. This may have been due to fears that an area would lose services if the regional center were not located in its office.

The recommendation that tribally operated health programs be required to report patient care and management information compatible with IHS data systems is being implemented as tribal contracts are renewed (37). Because the study group recommended development of a methodology for determining appropriate staffing in area offices, IHS headquarters has been working on a set of Resource Requirement Methodology (RRM) criteria, which incorporate workload and productivity standards, to satisfy that demand. There also is a headquarters study underway to identify area office functional components and determine their cost-effectiveness (59).

Finally, the 1984 study group supported the establishment of an IHS headquarters personnel office to handle all personnel matters throughout the system, instead of the current fragmented authorities. Standard job descriptions, career development initiatives, and revised operating policies were recommended. DHHS could facilitate implementation of changes such as these to strengthen IHS's personnel management and administration authorities.

IHS PLANNING FOR MANPOWER NEEDS

The number of staff that IHS needs, by profession, to deliver quality health services to its eligible Indian population is debatable, because IHS does not produce and document manpower needs projections. There is no formal manpower planning function in IHS headquarters or in the area offices; and IHS information systems do not maintain the demographic, epidemiologic, and utilization data necessary to support reliable population-based projections. Discussions of IHS staff shortages, therefore, often rely on anecdotal evidence of problems that may be limited to particular IHS areas. In order to determine manpower needs for recruiting purposes, IHS headquarters compiles requests for staff from the area offices. It is left to the IHS area offices to determine the number and mix of clinical staff, by type, that they require to do their work.

Although the annual RRM application process carried out in the IHS Office of Planning, Evaluation and Legislation may appear to be centralized manpower planning, in fact this is not the case, because RRM criteria are not used to determine present and future staff needs in existing IHS facilities and service units. The RRM criteria system was developed in the 1970s to plan the staffing of new and replacement IHS facilities, based on detailed, discipline-specific productivity standards and projected utilization rates and populations. Until recently, the annual IHS budget proposal included RRM-based projections of "ideal" staff needs, compared with authorized positions, as an estimate of "unmet need" for staff. RRM continues to be used in manpower planning for new facilities (although RRM is only the starting point, and the facilities generally are staffed at less than RRM levels); but now it is used primarily to cost out projected service utilization levels in the new resource allocation methodology (113,32,34).

Some IHS officials believe that RRM criteria may overstate manpower needs, both because they reflect idealized manpower standards and because they apply those standards separately to each discipline, then sum the parts, which ignores the potential efficiencies of a team approach. The RRM criteria were developed specifically for the IHS delivery system, with its relatively small facilities and emphasis on ambulatory services. Work comparing actual IHS hospital staffing with RRM-based staffing needs, done in the IHS headquarters Division of Health Services Planning and Operations Research in 1985, revealed that RRM criteria generated manpower needs that were greater than necessary for small facilities (fewer than 25 beds), close to actual staffing in facilities of 25 to 50 beds, and somewhat low for the larger IHS hospitals and medical centers. This analysis, which used data reported by IHS hospitals to the American Hospital Association's annual survey of hospitals, attempted to adjust for outpatient workloads and differences in scopes of service among the IHS hospitals (113).

During House hearings on the Indian Health Care Improvement Act in summer 1985, it was estimated that there were about 1,500 unfilled staff positions in IHS and tribally operated health programs (79). The May 1986 draft IHS study, "Bridging the Gap", referred to overall manpower shortages in the 10 to 15 percent range (101). In estimating the funding needed to raise IHS service delivery capability to parity with services available to the U.S. general public, the "Gap study" team applied RRM criteria as part of its formula (to translate utilization into manpower needs under ideal conditions, with associated costs) and concluded that the IHS parity funding requirement for fiscal year 1987 would be $925 million. That is, in order to support clinical services for IHS users at rates of hospital, physician, and dental service use corresponding to those of the U.S. population in 1983, $925 million would be needed, or $228 million beyond the President's 1987 budget request. Although staffing costs are the single largest component of the IHS budget, this $228 million funding gap cannot reliably be translated back into manpower needs.

In another approach to estimating IHS staff shortages, about 35 IHS service unit directors meeting in Rockville in July 1986 were asked to assess the overall adequacy of clinical staffing in their service units (including physicians, nurses, physician assistants, dentists, and allied health professionals). Responses ranged from a perception of adequate clinical staffing (no major deficiencies) in a few service units, to shortages estimated as high as 40 percent below need in other service units. Most service unit directors judged their actual staffing to be about 20 percent below what they felt they needed (19).

The numbers of staff vacancies to be filled each year, sometimes referred to as "recurring vacancies", provide another way of looking at IHS manpower shortages and needs.

Table 4, from a May 1986 draft internal study of IHS health manpower training programs, summarizes recurring vacancies by type of staff (57). These figures, which were obtained from IHS physician and nurse recruiting offices and headquarters program offices (e.g., dental services, mental health, sanitation service programs), indicate that IHS needs to recruit about 200 new physicians, 650 nurses, 50 dentists, and a variety of other staff to fill an expected 1,151 vacancies annually. These positions are not necessarily vacant throughout the year, nor do they represent positions for which no staff could be recruited. Many of them are "lapsed positions", that is, positions deliberately left vacant for a period of time for budgetary reasons (34,14). If all these vacancies were filled, staffing in IHS would not necessarily be ideal; it would only mean that all authorized positions were filled. The recurring vacancies do highlight, however, the level of recruiting activities that must be undertaken simply to maintain IHS manpower at current levels, whether those levels are adequate or not.

Two additional approaches to analyzing clinical staffing in IHS are described here. The first looks at variations among IHS areas in staff-to-workload ratios, and the results suggest that there is no consistent, planned allocation of manpower among the areas based on demonstrated workload. The second analysis compares staffing levels and costs in IHS hospitals with those in U.S. nonmetropolitan community hospitals, and finds both measures to be considerably higher in the IHS hospitals.

The comparison of IHS direct care workload clinical units per staff member in fiscal year 1984, by IHS area, was presented in the Office of Technology Assessment's (OTA's) report, Indian Health Care (80). Some IHS area offices have used similar methods in recent years to describe their manpower situations relative to other areas and to IHS in general. In the comparison presented in table 5, the workload measure is the number of clinical units, with each unit representing 1 hospital day. Outpatient visits were converted to clinical units by equating six outpatient visits to 1 hospital day (52). This analysis separates patient care staff from administrative staff; but because clinical versus administrative staff may be differently defined among the areas, some IHS officials recommend total staff-to-workload

Table 4.--IHS Estimated Recurring Annual Vacancies for Selected Professional Categories, 1986

Profession	People Needed to fill Vacancies[1]
Nurses	650
Physicians	200
Dentists	50
Pharmacists	32
Medical Technologists	4
Health Records Administrators	60
Engineers	15
Sanitarians	12
Nutritionists	31
Accountants	85
Statisticians	12
Total	1,151

[1] Estimated need is based on numbers of recurring vacancies due to attrition, resignation, unfilled positions, and retirements.

SOURCE: U.S. DHHS, PHS, HRSA, IHS, "Indian Health Service Manpower Programs: FY 1988, Planning Paper", draft, 1986.

Table 5.—IHS Area Comparison of IHS Direct Care Workload by Clinical Units, Fiscal Year 1984[1]

Area	1984 service population	(i) Clinic outpatient visits	(ii) Hospital outpatient visits	(iii) Hospital days: Adults and peds.	(iv) Hospital days: Newborns	(v) Clinical units	(vi) Total staff	(vii) Clinical staff	(viii) Clinical units per staff	(ix) Clinical units per clinical staff
Aberdeen	70,648	116,660	295,104	44,612	2,654	115,893	915	476	127	243
Alaska	71,329	64,508	197,872	68,084	4,348	116,162	1,260	600	92	194
Albuquerque	51,211	108,754	162,900	27,467	1,485	74,228	918	466	81	152
Bemidji	47,000	47,037	62,349	5,300	242	23,853	270	146	88	163
Billings	40,106	169,519	100,866	11,819	800	57,683	616	292	94	198
California	71,642	86,440[2]	NA	NA	NA	0	61	5	—	—
Nashville	35,822	4,563	56,338	6,329	199	16,678	189	105	88	159
Navajo	162,005	[illegible],305	462,894	88,813	9,881	194,394	2,033	1,191	96	163
Oklahoma	190,451	254,337	312,036	49,653	7,830	151,879	1,605	921	95	165
Phoenix	82,309	94,510	295,289	80,439	3,436	148,842	1,546	795	96	187
Portland	96,427	212,547	NA	NA	NA	35,425	388	184	91	193
Tucson	17,852	22,388	36,616	7,315	184	17,333	154	85	113	204
Headquarters	0	NA	NA	NA	NA	0	387	72	—	—
IHS total	936,802	1,206,128	1,982,264	389,911	31,059	952,369	10,342	5,360	92	178

[1] Utilization figures in this table represent IHS direct care workloads. Outpatient visits to tribally operated programs and urban projects, and contract care program utilization, are not included. Columns (i) through (iv) include IHS facilities only; column (v) assumes 6 outpatient visits equal 1 hospital day; and columns (vi) and (vii) include Federal employees assigned to tribal contractors under IPAs and MOAs. Staff hired directly by the contractors are not included.

[2] Provisional data from the California Program Office, "Workload Statistical Summary," calendar year 1984.

SOURCES: U.S. DHHS, PHS, HRSA, IHS, service population estimates from the population statistics staff; outpatient visits and hospital days from the patient care statistics staff; total staff and clinical staff from the Office of Indian Resources Liaison (unpublished data), 1985.

comparisons (32). Therefore, table 5 presents ratios of clinical units both to clinical staff and to total staff.

Based on either staff count, the ratios in table 5 show that the distribution of IHS manpower among its 12 areas is not consistently related either to direct care workload (as approximated by clinical unit measures) or to the size of the service population. IHS as a whole averaged 92 clinical units per staff member, or 178 clinical units per clinical staff member. The range in clinical units per total staff was from 81 in the Albuquerque area to 127 in Aberdeen. In terms of clinical units to clinical staff, the ratios ranged from a low of 152 units-per-staff (Albuquerque) to a high of 243 units-per-staff (Aberdeen). (Analyses for the California area could not be completed because of data limitations, and total staff may be undercounted in areas heavily dependent on tribally operated programs.) These figures suggest that workloads for individual providers must vary considerably among the IHS areas, but further analyses would be required to determine effects on delivery at the service unit level.

The annual survey of hospitals by the American Hospital Association (AHA) provides consistent size, utilization, cost, and services data for most U.S. hospitals. Data were abstracted from AHA's 1984 hospital survey for the 39 IHS and tribally operated hospitals that participated in the survey (1,2). Table 6 shows utilization, staffing, and expenditure data for the IHS hospitals, by bed size group.

There are differences among IHS hospitals in the scope of services they offer. As a group, they provide a more comprehensive range of outpatient and social support services than do U.S. community hospitals, with fewer specialized inpatient services. The two groups of hospitals differ markedly in average size: the 40-bed average IHS hospital is much smaller than the typical U.S. community hospital of 177 beds. The largest IHS hospital, the 170-bed Anchorage Indian Medical Center (not among the 39 hospitals included here), is in the mid-range of moderate-sized hospitals (100 to 399 beds) by AHA standards. Only 5 of the total 51 IHS hospitals have more than 100 beds.

Important caveats apply to this analysis. IHS hospitals provide substantially more hospital-based outpatient services than U.S. community hospitals, and this analysis does not adjust for that major difference. Most nonmetropolitan U.S. community hospitals are not as isolated as IHS hospitals, and they are not as likely to be the sole health care providers in their geographic areas. IHS hospitals may define and report their services differently. For example, an IHS hospital may include the staff and costs of one or more satellite delivery sites as part of its hospital program. Furthermore, IHS hospitals report physicians as hospital staff, because they are IHS employees; a community hospital normally does not employ most of the physicians who use its facilities. In very isolated areas, such as Alaska, IHS staff also may include facility maintenance and support employees (electricians, plumbers, carpenters) who cannot be hired from the community on a contract basis. For these reasons, IHS hospital staff counts are likely to be high relative to those of U.S. community hospitals (41,47,113).

Average length of stay was 5.0 days in the 39 IHS hospitals included in this analysis, compared with 7.3 days in all U.S. community hospitals and 6.9 days in U.S. nonmetropolitan hospitals only (1984 data). Average occupancy in the IHS hospitals was 48.3 percent, compared with 69.0 percent in all U.S. community hospitals (60.7 percent occupancy in U.S. nonmetropolitan hospitals versus 71.5 percent in metropolitan hospitals). Table 6 shows average occupancy rates in IHS hospitals by bed size group, ranging from 39.2 percent in hospitals with fewer than 25 beds to 73.7 percent in the two hospitals reporting with more than 100 beds. The lower average lengths of stay and occupancy rates in IHS hospitals, as compared with U.S. community hospitals, are consistent with their smaller average size and more limited scope of services.

Personnel costs in IHS hospitals were high relative to those in other U.S. community hospitals in 1984. In the 39 IHS hospitals, 58.5 percent of total hospital expenditures (table 6) were devoted to payroll costs, compared with an average of 47.2 percent in U.S. community hospitals; in hospitals of 100 to 199 beds, 65.3 percent of total expenditures in two IHS hospitals went to payroll, versus 45.6 percent in U.S. community hospitals. The IHS hospitals averaged 3.38 staff per bed, while in U.S. community hospitals the ratio was 2.97 staff per

Table 6.--Selected Data for IHS and Tribally Operated Hospitals, by Hospital Bed Size Group, 1984[1]

		Size		Utilization					Staffing		Expenditures				
IHS Hospitals by Bed Size Group	No. of Hospitals[2]	Total Beds	Avg. Beds/ Hosp.	No. Admis- sions	No. Inpt. Days	ALOS[3]	ADC[4]	Percent Occ.	No. Staff	Staff per Bed	Total Expend. ($1,000s)	Payroll Expend. ($1,000s)	Payr. as % Total Expend.	Total $ Exp. per Inpt. Day	Average Salary/ Staff
6-24 beds	11 (of 13)	199	18.1	6,529	28,548	4.4	78	39.2%	670	3.37	$30,848	$15,439	50.0%	$1,081	$23,043
25-49 beds	18 (of 22)	612	34.0	20,390	93,330	4.6	255	41.7%	1,978	3.23	$70,222	$42,586	60.6%	$ 752	$21,530
50-99 beds	8 (of 11)	474	59.3	16,665	78,324	4.7	214	45.1%	1,547	3.26	$67,771	$38,141	56.3%	$ 865	$24,655
100-199 beds	2 (of 5)	289	144.5	12,506	77,958	6.2	213	73.7%	1,120	3.88	$38,098	$24,865	65.3%	$ 489	$22,201
Over 200 beds	0	0	0.0	0	0	0.0	0	0.0%	0	0.00	0	0	0.0%	0	0
All Hospitals	39 (of 51)	1,574	40.4	56,090	278,160	5.0	760	48.3%	5,315	3.38	$206,939	$121,031	58.5%	$ 744	$22,772

[1] Data reflect the 39 of 51 IHS and tribally operated hospitals that reported complete information.

[2] Number of hospitals reporting data, of total IHS and tribal hospitals in each bed size group.

[3] Average length of stay.

[4] Average daily census.

SOURCE: Adapted by OTA from data reported in American Hospital Association (AHA), American Hospital Association Guide to the Health Care Field, 1985 Edition, Chicago, 1985.

bed. The average salary for all employees of U.S. community hospitals, all sizes, was $19,287; for the 39 IHS hospitals, it was $22,772, which was higher than the $20,143 average salary of employees in the largest urban U.S. hospitals. The fact that IHS hospitals employ more physicians than do U.S. community hospitals no doubt is a factor in this difference.

In all U.S. community hospitals, total expenditures per inpatient day in 1984 averaged $480 (total rather than inpatient expenditures only were used for comparability with data available for the 39 IHS hospitals). In 39 IHS hospitals, the average total expenditure was $744 per inpatient day, which exceeded the average per diem expenditure of $538 in the largest U.S. community hospitals with the highest expenditures. IHS expenditures per inpatient day were higher than those in U.S. community hospitals in part because IHS hospitals, with their low occupancy rates and shorter average stays, provided fewer inpatient days relative to their size and volume of outpatient services than did the community hospitals. Although there are major differences between IHS and U.S. hospitals in terms of outpatient volume and types of staff employed, the patient care and salary costs seem to be so much higher in IHS hospitals that they raise questions about the efficiency of the IHS system as a whole. These preliminary findings suggest that to ensure the most effective use of available resources, especially manpower, IHS could undertake a more detailed analysis of the costs and staffing of its hospital system.

Not all of the individuals included as IHS staff in year-end totals (e.g., in tables 1, 2, and 3 earlier in this report) are permanent employees. A significant number of them are in "temporary intermittent" status, which means they worked for IHS for periods ranging from 2 weeks to 12 months of the year. These individuals are funded from the Medicare and Medicaid reimbursements that IHS service units collect for services provided to Indians who also are beneficiaries of those public programs. Based on data obtained from the IHS headquarters contract care office, it appears that in fiscal years 1983 and 1984, about 500 individuals were employed with Medicare and Medicaid funds; and in fiscal year 1985, the figure was nearly 800. Medicare and Medicaid funds are used primarily to hire nurses, medical records technicians, and other allied health personnel, although in 1985, 10 physicians worked for some part of the year under Medicare and Medicaid funding. "Temporary intermittent" employees are not extra or non-essential staff: they represented about 7 percent of the 10,394 IHS employees at year-end 1985, and many of them filled positions required for facility accreditation by the Joint Commission on the Accreditation of Hospitals (JCAH). Changes in IHS policies regarding the collection and use of third-party reimbursements could quickly affect the ability to retain these staff, and the overall staffing situation in some service units would suffer from their loss (77,30).

MANPOWER PLANNING IN OTHER ORGANIZATIONS

A review of manpower planning methods used by other health service systems revealed that, beyond general rules of thumb (e.g., the one physician per 1,000 members standard used in many prepaid plans), most organizations adjust their staffing levels based on experience rather than on detailed needs forecasts. Most of the staffing standards identified were utilization-based, sometimes with separate age and sex rates, but in no case were they based on the incidence and prevalence of major medical conditions in the populations served.

There are no nationally recognized standards of ideal health care staffing that can be used to evaluate the adequacy of current staff levels in IHS. Health professional associations usually do not recommend specific provider-to-population ratios, and in any case such recommendations would have to be adjusted to the populations served. The accreditation standards of the JCAH do not meet this need. JCAH accreditation is widely accepted in the medical community as evidence of good quality care, but the standards are not sufficiently detailed to assess the adequacy of staffing in individual hospitals or groups of hospitals. JCAH may require, for example, that a particular hospital department be headed by a qualified physician and have certain types of nurses on its staff; but because the standards are not related to utilization levels, they do not provide guidance as to the numbers of staff, by type, that are needed to deliver a certain volume of services.

Staff-to-population ratios reflect the historical availability of resources and services, rather than any absolute standard of what a population needs. Due to data limitations, most health planning methods have not been able to go beyond resource- or utilization-based standards to project population needs based on demographic and epidemiologic characteristics. For the same reason, such an analysis is not possible for the IHS population. Rough staff-to-population ratios indicate, however, that overall IHS physician and dentist manpower may not be out of line with that available to the U.S. nonmetropolitan population.

When IHS and U.S. ratios of health professionals to population are compared, IHS as a whole provided 0.7 physicians per 1,000 eligible service population in 1984 (table 7), while the U.S. population was served by 1.65 active, non-Federal, patient care physicians per 1,000 (1980)(80). The geographic distribution of physicians in the U.S. varies greatly, however, between metropolitan and nonmetropolitan areas. In 1980, for example, there were 1.91 physicians per 1,000 U.S. population in metropolitan areas, and 0.84 per 1,000 in nonmetropolitan areas. The U.S. nonmetropolitan rate is much closer to the IHS ratio of 0.7 physicians per 1,000, and clearly the conditions of IHS service delivery more closely resemble those of rural America than of the metropolitan centers. It is interesting to note that in several IHS areas, including Alaska, Phoenix, Albuquerque, Billings, Navajo, and Tucson, IHS physician-to-population ratios ranging from 0.8 to 1.4 per 1,000 matched or exceeded the U.S. nonmetropolitan average. The pattern for dentists was similar: in IHS, there were 0.3 dentists per 1,000 eligible population in 1984; and in the U.S. (1979) there were 0.46 dentists per 1,000, overall, 0.5 per 1,000 in metropolitan areas, and 0.31 dentists per 1,000 population in nonmetropolitan areas (111,80).

Group practice settings such as health maintenance organizations (HMOs) tend to use population- and utilization-based manpower planning standards. HMOs come to mind in seeking manpower guidelines for IHS because, like IHS, HMOs are nearly the sole source of comprehensive ambulatory and inpatient care for a known population. HMOs are prepaid, which means that as in IHS, out-of-pocket costs of care do not operate as barriers to access.

Table 7.—IHS Medical and Dental Officers in Relation to Eligible Service Population by Area, Fiscal Year 1984[1]

Area	IHS eligible service population (1984)	Clinical		Service population ratios	
		Medical officers	Dental officers	Physicians per 1,000	Dentists per 1,000
Aberdeen	70,648	25	20	0.4	0.3
Alaska	71,329	98	35	1.4	0.5
Albuquerque	51,211	52	20	1.0	0.4
Bemidji[2]	47,000	18	13	0.4	0.3
Billings	40,106	40	17	1.0	0.4
California[2]	71,642	1	0	0.0	0.0
Nashville[2]	35,822	9	3	0.3	0.1
Navajo	162,005	145	42	0.9	0.3
Oklahoma	190,451	94	44	0.5	0.2
Phoenix	82,309	110	23	1.3	0.3
Portland[3]	96,427	25	17	0.3	0.2
Tucson	17,852	14	3	0.8	0.2
Headquarters	0	14	3	—	—
IHS total	936,802	645	240	0.7	0.3

[1] Forty-four medical officers and 29 dental officers serving in nonclinical capacities during fiscal year 1984 have been excluded from these calculations. IHS employees of tribal contractors assigned under IPAs and MOAs are included with IHS full-time, permanent staff. Staff hired directly by the contractors are not included.

[2] Total numbers of staff probably are low in these areas, because staff hired directly by tribal contractors are not included; consequently, service population ratios may be low.

[3] IHS staffing is somewhat low in the Portland area because there are no IHS hospitals there, and nearly half the budget is spent on contract care.

SOURCES: U.S. DHHS, PHS, HRSA, IHS, service population estimates from the population statistics staff; medical and dental officers in clinical practice from the Office of Indian Resources Liaison (unpublished data), 1985.

While it appears that most HMOs rely on experience rather than specialized manpower planning models to determine staff needs (that is, additional physicians are added when utilization demands it or when patients complain about long waits for appointments), they do maintain reliable information on what their staff-to-enrollee ratios are. Detailed HMO staffing ratios are not generally accepted, however, because there are many organizational differences among HMOs in addition to differences in their patient populations. Staffing ratios, for example, will vary with the particular type of prepaid organization (hospital-based group practice, independent practice association, or other); the size of the organization (number of enrollees); the HMO's policies about contracting out for specialty services (i.e., the range of services provided in-house vs. contracted); whether patients may self-refer to specialists, or whether they must go through a primary care gatekeeper; the extent of nonplan use by enrollees; and geographic variations in general physician practice patterns.

These unknown factors make comparisons of HMO and IHS manpower ratios tentative. The populations served by HMOs, as a group, also are likely to be substantially different from those served by IHS. HMOs enroll employed individuals and their families, often from middle class and upper socioeconomic categories. One frequently cited explanation for lower service utilization rates in HMOs is the claim that HMOs tend to enroll a healthier population. IHS, on the other hand, serves a population that more closely resembles the Medicaid population in terms of higher unemployment, lower socioeconomic status, the greater health care needs of underserved populations, and the complications of poor nutrition, sanitation, and housing. OTA and other sources have documented poorer health status among Indians, compared with the U.S. general population, as well as a markedly different age distribution. The manpower ratios that would be adequate to serve the largely middle class, employed population of a metropolitan HMO, therefore, probably would not be adequate for the IHS system.

The primary source of information about actual staffing ratios in HMOs is the trade association for prepaid group practices, the Group Health Association of America. A review of literature in their library produced several studies of staffing ratios, some by medical specialty. Most of the detailed ratios, however, averaged out to the general rule of one physician per 1,000 enrollees. The most recent published survey results from the Group Health Association of America, representing 53 of its member organizations and 6 million enrollees, indicated that in 1980, this general rule still appeared to be valid for planning purposes (28).

A study of nine federally qualified HMOs in the early 1980s found that they averaged 0.9 physicians (full-time equivalents) per 1,000 enrollees, combining 0.6 primary care physicians with 0.3 specialists per 1,000. This study found great variation in the use of nurses and other clinical support staff relative to the numbers of physicians and enrollees. Clinical support staff ranged from three to five per 1,000 enrollees. Nursing staff alone ranged from 0.5 to 3.2 nurses per physician in those nine HMOs; all clinical support staff (including nurses) ranged from 2.5 to 6.2 per physician (110).

Ratios of physicians and clinical support staff to enrolled population, total and by specialty, vary so much among HMOs of different types and sizes that they are of limited use as manpower planning standards. Given the differences between HMO and IHS populations, the average ratio of one physician per 1,000 enrollees in HMOs could be a low target for the less healthy IHS population. In fact, the IHS ratio of physicians to estimated eligible service population in 1984, at 0.7 physicians per 1,000, was well below the HMO average. On the other hand, the number of IHS physicians upon which this ratio was based does not include non-IHS contract care physicians, and it probably excludes some physicians employed by tribally operated health programs as well. It is clear that HMO staffing models could not be transferred directly to the IHS health care system; nonetheless, HMO planning approaches could merit careful review by IHS managers.

CHAPTER 3

INDIAN HEALTH SERVICE STAFF RECRUITMENT AND RETENTION

Physicians always have been the most difficult type of clinical staff for the Indian Health Service (IHS) to recruit, and as a consequence, IHS for many years has maintained a physician recruiting function. Physician recruitment was especially critical during the period between the end of the physician draft in 1973 and the beginning of physician availability from the National Health Service Corps (NHSC) in the late 1970s. In the 1980s, as large classes of NHSC scholars became available for service, pressure on IHS to recruit physicians from the private sector was reduced. In recent years, IHS has recruited 130 to 150 physicians annually from the NHSC. IHS officials report, however, that physician recruitment is again becoming more difficult; and beginning in 1988, the numbers of NHSC physicians will diminish rapidly. The recruitment of nurses also is becoming more difficult. Therefore, IHS is gearing up now for more extensive recruiting efforts.

The IHS physician recruitment program consists of a small headquarters office (a staff of five professionals and three clerical staff) and a designated recruiter in each of the 12 IHS area offices. The area office staff generally are not full-time recruiters: often, the area deputy director or chief medical officer assumes physician recruitment responsibilities. The headquarters nursing services branch coordinates nurse recruiting by the areas, but on a smaller scale than the physician recruitment program. IHS has succeeded in recruiting about 50 physicians a year on a voluntary basis, and it has hired most of the approximately 650 nurses it needs each year through general advertising campaigns. The NHSC has not been a major supplier of nurses to IHS. IHS also has been concerned about improving its retention of physicians and nurses in order to reduce future recruiting needs.

Whether the NHSC scholarship program is reauthorized or not, there will be a gap of at least several years in which few obligated NHSC physicians will be available for service. The Public Health Service (PHS) is considering a loan repayment program to replace NHSC scholarships as an incentive to obligated service, but such a program would require congressional approval and funding. As discussed in chapter 6 of this report, the Indian health manpower training programs (under Public Law 94-437) at their present levels will not produce enough Indian physicians and nurses to have a significant effect on anticipated losses. It appears, therefore, that IHS may need to fill vacancies in its clinical workforce by hiring physicians, dentists, nurses, and other professionals from the private sector. This section discusses how IHS plans to meet its recruiting needs and how circumstances external to IHS, specifically the growing surplus of physicians in the U.S., may affect IHS recruiting activities.

THE IHS PHYSICIAN RECRUITING STRATEGY

In the spring of 1986, an IHS in-house task force began work on a comprehensive physician recruiting plan that was presented to the IHS Director and approved in July. The plan included expansion of existing recruiting activities, plus some new programs and increased cooperation in NHSC recruiting efforts (27). The purpose of adopting a formal recruiting strategy was to focus attention and support throughout IHS and its area offices on an organized, comprehensive approach. The plan was discussed by the IHS area recruiters and chief medical officers at their August meetings, and by IHS clinical directors in October 1986.

The physician recruiting task force stated the problems facing IHS as follows (27):

> The National Health Service Corps (NHSC) Scholarship Program has in the past provided up to 60 percent of IHS physician manpower. As this supply of obligated physicians plummets, it is feared that many of the remaining physicians will leave due to severe staffing shortages. The number of volunteer (non-obligated) physicians expressing interest in the IHS has decreased in spite of the overall increasing supply of physicians.

IHS physician recruiting needs were estimated by the group at approximately 200 new physicians annually. To meet that target, the plan called for activities to implement three general manpower strategies: 1) increased recruitment of voluntary physicians; 2) new programs requiring compulsory (payback) service; and 3) improved retention of current staff. Figure 1 lists the specific activities that were approved, with estimated first year and recurring costs (as of August 1986). Note that this recruiting plan comprises activities that can be undertaken within existing IHS authorities, and does not include the loan repayment program, which would require new legislation.

In order to recruit more voluntary physicians, there would be increased advertising in newspapers and professional journals in conjunction with the NHSC, with joint screening of respondents; visits by IHS recruiters to all U.S. medical schools at least twice a year; development of a network of IHS alumni advocates; an increase in IHS physician recruitment conferences from three to four annually; increased IHS exhibits at national and regional professional meetings; and new IHS and area information booklets and recruiting videotapes. In addition to a new residency training program with priority for IHS physicians and increased continuing medical education opportunities to improve physician retention, the IHS task force called for implementation of a 6 percent special bonus for hard-to-fill sites and specialties that is authorized for PHS Commissioned Corps officers but has not been used.

The physician recruiting task force recommended that all activities be funded at reduced levels, if necessary, rather than eliminating any of them entirely. It was suggested that some proposals might be funded initially from the 1986 supplemental appropriation, including the medical school advocacy program, new IHS exhibits and videotapes for recruiting meetings, a headquarters recruiting information booklet, and support for the American College of Obstetricians and Gynecologists' volunteer program. Some funding was obtained from 1986 appropriations, but full implementation of the IHS physician recruiting strategy began in October 1986 with fiscal year 1987 funding. The IHS Director approved an additional $1.5 million to support recruiting activities, bringing the IHS Health Manpower Support Branch total budget to $3,987,000 (23). The headquarters recruiting staff was not enlarged, although additional positions had been requested as part of the plan.

Much of the additional 1987 funding will support new activities. In the most ambitious new program, the IHS out-of-service residency training program, 20 physicians will be sponsored in family practice residencies and an additional 5 physicians will be supported in

Figure 1.--Summary of Physician Recruitment Plan Elements with Comparison of Fiscal Year 1986 Budget and the Manpower Strategy Budget, as Proposed to IHS Director, July 1986

A. RECRUITMENT ELEMENT	FY 86 Budget	1st Year Costs	Recurring Costs
1. Advertising: Increase advertisement in newspaper and professional journals.	$ 100,000	$ 250,000	$ 250,000
2. Medical School Advocate: Establish an IHS advocate at each allopathic and osteopathic school.	$ 90,000	$ 300,000	$ 90,000
3. Medical Student Clerkship: Medical clerkship program for late third and fourth year medical students.	$ 225,000	$ 300,000	$ 300,000
4. Residency Rotations: Primary care residency rotations during the second year.	$ ------	$ 200,000	$ 200,000
5. Medical School Visits: All medical schools visited at least twice a year.	$ 65,000	$ 300,000	$ 200,000
6. Site Visits: Travel for physician and spouse for site visits.	$ 100,000	$ 190,000	$ 190,000 (a) $ 360,000 (b)

(a) Physician travel only
(b) Physician and spouse travel, add $170,000

7. Alumni Network: Develop an alumni advocacy network with former IHS physicians.	$ 90,000	$ 100,000	$ 100,000
8. IHS Exhibits: Increase IHS exhibits at national and regional professional meetings.	$ 20,000	$ 40,000	$ 40,000

(continued)

Figure I.--Summary of Physician Recruitment Plan Elements (Continued)

A. RECRUITMENT ELEMENT	FY 86 Budget	1st Year Costs	Recurring Costs
9. Recruitment Conferences: Increase the number of medical recruitment conferences to four per year.	$ 250,000	$ 250,000	$ 250,000
10. Promotional Literature: Develop and print Headquarters and Area Information Booklets.	---	$ 150,000	$ 90,000
11. IHS Video Tapes: Develop IHS recruitment video tapes to be used by recruiters and advocates.	---	$ 300,000	$ 100,000
SUB TOTAL	$ 940,000	$2,380,000	$1,910,000*

* Without spouse travel
With spouse travel: $2,080,000

B. LONG-TERM TRAINING

1. Sponsor 20 family medicine residents in out-of-service residency training programs as well as 5 residents in IHS needed or required specialties.	---	$ 860,000	$1,200,000

C. STAFFING REQUIREMENTS

1. Headquarters	$ 239,800	$ 330,400	$ 330,400
2. Area Office Staff			
a. 5 Full-Time	$ 150,000	$ 210,000	$ 210,000
b. 7 1/2-Time Staff	$ 100,000	$ 147,000	$ 147,000
3. 2 Physician Staff	---	$ 90,000	$ 90,000
SUBTOTAL:	$ 489,800	$ 777,400	$ 777,400
TOTAL:	$1,429,800	$4,017,400	$3,887,400*

* Without spouse travel
With spouse travel: $4,057,400

(continued)

Figure 1.--Summary of Physician Recruitment Plan Elements (Continued)

Physician Salary Costs

These additional costs should not be included
as part of recruitment activities.

1. Implement the 6 percent special bonus for hard-to-fill sites and specialties.	---	$ 360,000	$ 360,000
2. Increase the continuing medical education funding for physicians.	$ 475,000	$ 850,000	$ 850,000
TOTAL	$ 475,000	$1,210,000	$1,210,000

SOURCE: U.S. DHHS, PHS, HRSA, IHS, John Gimon, Rick Olson, and Steve Permison, Memorandum to Dr. Everett Rhoades, "Summary of Strategies for IHS Physician Manpower Needs," July 7, 1986.

other medical specialties. Physicians already employed by IHS will have preference for these residencies, and Indian preference also will apply. Each month of sponsorship will entail two months of payback service as a Commissioned Corps officer in an IHS location. Now being organized, this program is budgeted at $860,000 for fiscal year 1987; by December 1986, 18 physicians had applied (25). Another new program will support 50 to 60 primary care residency rotations, preferably in the second rather than the third year of residency, for about $200,000. Finally, a new program to identify and support IHS physician recruitment advocates in U.S. medical schools will be implemented in 1987 with the assistance of an outside contractor. Startup costs are estimated at about $300,000.

In addition to these initiatives, there will be increased funding in 1987 (about $300,000) for the successful medical student clerkship program for late third- and fourth-year students. The task force noted that almost half of all IHS voluntary recruits had participated as medical students in this clerkship program, which pays travel expenses and a living stipend, if necessary, for student placements in IHS programs during academic breaks. As an incentive for physician retention, the continuing medical education allowance has been raised to $1,000 per physician per year, or $1,300 per physician in Alaska (23). Progress also is being made to develop and implement a data system that will link the 12 areas and IHS headquarters for manpower recruiting purposes (6).

IHS and the NHSC (on behalf of community health centers and migrant health programs) are the only programs in PHS that recruit physicians, and there is increasing emphasis on coordinating their efforts. Since 1985, the two programs have used the same 800 telephone number, managed by an outside contractor, to screen responses to their general advertising campaigns. Some IHS officials found results of the 1985 screening program to be disappointing: most respondents were unqualified for IHS employment, primarily because they were foreign medical graduates without U.S. residency status (20,7). Nonetheless, IHS is committed to increased joint recruiting activities with the NHSC. IHS has instituted bi-weekly staff meetings with NHSC, and has proposed a formal Memorandum of Agreement between the two agencies to define their cooperative efforts. Under this agreement, IHS would fund three staff positions in NHSC to support the joint activities.

IHS and NHSC officials agree that a physician loan repayment program is needed at least temporarily to recruit obligated physicians. This proposal has the support of the NHSC's parent organization, the Bureau of Health Care Delivery and Assistance in the Health Resources and Services Administration (HRSA), and of PHS (see chapter 4 for further discussion of the loan repayment program). Finally, IHS and NHSC agree that authorization to pay for spouse travel, when interested physicians visit potential placement sites, would improve recruiting success. The programs paid for spouse travel in the past, then were prohibited from doing so by the HRSA contracting office, and now need specific authorization (e.g., in appropriations language) to resume the practice. The present prohibition against spouse travel is a significant handicap in competing with private sector physician recruiters, IHS officials say. IHS and the NHSC already share site visit costs when a physician wishes to visit a combination of IHS and NHSC sites (61,63,20).

EVALUATION OF THE IHS PHYSICIAN RECRUITING PLAN

It is encouraging that IHS is preparing now for substantially increased manpower recruiting efforts, and the plan developed by informed in-house staff can serve to direct those efforts. The IHS Director has approved the plan in full and allocated an additional $1.5 million in fiscal year 1987 funding (an increase in the Health Manpower Support Branch budget of nearly 60 percent) for physician recruiting activities. Efforts are underway to build commitment to the recruiting activities among IHS area office and service unit staff, and to promote cooperation with the recruiting efforts of the NHSC. These developments are all positive and merit support. The following observations may be considered as possibilities for expanding and improving upon the steps that already are being taken.

If IHS is going to build strong support for its recruiting activities in Congress and the Administration, the Health Manpower Support Branch that will oversee implementation of the recruiting strategy should be prepared to document progress in each activity with records of associated costs, problems, and accomplishments. The proposals to increase physician recruiting and retention appear to be reasonable, and several of the activities build upon experience with existing, smaller programs. It will be essential, however, to monitor how effectively each activity contributes to the final objective of a larger and more stable IHS clinical staff. IHS recruiting capability has not been tested in recent years because the majority of its new physician recruits have come from the NHSC. Although IHS has recruited about 50 voluntary physicians annually, there is no evidence that it can recruit the 200 physicians it will need each year in the future. Therefore, all recruiting efforts should be documented and evaluated, so they can be redirected, if necessary, for maximum success. If IHS is to enjoy the support it needs from the Department of Health and Human Services (DHHS) and Congress to implement its recruiting plans, it must be prepared to document its program activities well enough so that they can be assessed objectively.

It is difficult to assess the accuracy of future physician needs projected in the IHS strategy paper (see figure 2), because no background information was provided to substantiate those projections either in the plan itself or by IHS task force members. Will the ability to recruit 200 new physicians a year be enough to maintain IHS staffing at its current levels, relative to utilization? IHS recruiters seem confident that 200 physicians will be adequate to maintain current service delivery (25). Any number of factors could aggravate the situation, however. The recruiting strategy task force noted that the relatively rapid loss of NHSC physicians could create severe staffing shortages, which in turn would cause other physicians to leave. The effects of inadequate support staff would compound the situation. The task force noted that in recent years, at least 60 percent of new physicians each year have come to IHS to pay back their NHSC service obligations. NHSC physicians are obligated to 1 to 4 years of service, depending on the length of their scholarship support. But retention of NHSC physicians in IHS after their obligated service is finished has been poor: only 5 percent of NHSC scholars have served even one year beyond their obligated service (26). Therefore, as

Figure 2a.--IHS Projected Physician Staff Needs (1987-1993)

Year	1987	1988	1989	1990	1991	1992	1993
IHS Direct[1] Care	790	805	821	837	853	870	887
Tribal[2] Programs	40	40	42	42	44	44	46
Total Needs	830	845	863	879	897	914	933

[1] Allows for a 2 percent annual increase of physician staff based on population growth, new facilities being built, and increased staffing for these new facilities.

[2] Allows for a modest increase in tribal programs. This includes urban programs as well as 638 programs in which the IHS may be requested to provide assistance in staffing. Includes only full-time physician positions.

Figure 2b.--IHS Projected Physician Staff Needs, by Specialty (1987-1993)[3]

Year	1987	1988	1989	1990	1991	1992	1993
Family Practice	85	92	95	100	106	110	115
Pediatricians	20	22	24	26	28	30	32
Internists	22	25	28	30	33	36	39
Anesthesiologists	6	3	3	3	4	4	4
Emergency Medicine	5	5	6	6	6	7	7
Obstetricians/ Gynecologists	12	10	10	10	10	12	12
Psychiatrists	8	8	9	9	10	10	11
Orthopedic Surgeons	3	3	3	3	4	4	4
Ear, Nose & Throat	1	1	1	1	1	1	1
General Surgeons	8	5	5	6	6	6	7
Radiologists	2	2	2	2	2	3	3
General Medical Officers	22	22	22	24	24	24	26
Total	194	198	208	220	234	247	261

[3] The projections reflect increased staffing needs plus a modest increase in the retention of physicians.

SOURCE: U.S. DHHS, PHS, HRSA, IHS, John Gimon, Rick Olson, and Steve Permison, memorandum to Dr. Everett Rhoades, "Summary of Strategies for IHS Physician Manpower Needs," July 7, 1986.

NHSC physicians complete their service periods and are not replaced, the overall deficit in physician staffing 4 to 6 years from now could exceed the anticipated 200 per year.

The IHS recruiting plan estimated the total numbers of physicians IHS and tribal programs would need annually from 1987 through 1993, and broke those numbers down to physician needs by medical specialty (figure 2). Justifications for the detailed projections included: allowance for a 2 percent yearly increase in physician staff based on population growth and new facilities; a modest increase in physician retention; and a modest increase in tribal and urban Indian health program needs. No historical data on IHS staffing, total or by specialty, were provided to support the projections (and when asked for such documentation, IHS was unable to provide it) (22,62). The recruiting office has not kept records of past vacancies or recruits, by source (voluntary or NHSC obligated), or by medical specialty; but it could do so from now on.

One component of a successful recruiting program not specifically mentioned in the strategy plan is an automated data system to support recruiting activities. Some IHS areas have computerized systems that maintain current staffing rosters and help anticipate vacancies. The headquarters office, however, has no such automated support system, and the systems operating in the areas are not compatible among themselves or with headquarters. The nursing services branch also reported a need for computer support for its nurse recruiting activities (55,64). If IHS is to compete with private recruiters, it should be able to pursue a reasonably systematic and coordinated program. Necessary housekeeping chores, such as maintaining master files of medical school and physician contacts, should be automated now as the program begins to grow. Without a compatible data system linking the areas and headquarters, the proposed recruiting strategies may not be optimally successful. The Navajo area has taken the lead in developing a data system proposal that the other areas might adopt; this proposal was being considered in October 1986. The data system could include items to facilitate automated monitoring, documentation, and reporting on program activities, to meet needs discussed above. As an alternative to a coordinated IHS headquarters/area office data system, IHS and its areas could evaluate the possibility of joining the system that links Federal regional offices for NHSC recruitment and placement purposes (40).

The respective roles of IHS headquarters and area office staff in the overall physician recruiting strategy, and the most effective allocation of resources among these participants, are matters that do not appear to be clearly defined. The approved recruiting plan focused almost entirely on activities to be performed either by the small headquarters staff, or by private contractors under headquarters supervision. It might be worthwhile to consider to what extent the 12 area offices could be funded for increased participation in these activities.

Some functions could be carried out most effectively at the headquarters level; but much recruiting work is done in the areas, where area office and service unit staff identify their needs, interview candidates, and make selections to fill their vacancies. The area office physician recruiters meet as a group with headquarters staff several times a year, usually in conjunction with the recruiting conferences. At the physician recruiters' meeting in August 1986, during which the headquarters recruiting plan was discussed, it was apparent that some areas already have well-established recruiting programs. The areas vary considerably in their recruiting needs and problems, as well as in the approaches they have taken to meeting their needs. Some areas, such as Alaska and the Southwest, are viewed as attractive practice sites; as a result, physician recruiters in those areas may be able to pick and choose among candidates. The Northern Plains areas generally have been less attractive, but special efforts can make a difference: in Aberdeen, the area director reallocated funds for an additional 15 physician positions, and 5 of them had been filled by late summer 1986.

Several area office recruiters maintain ongoing contacts with medical schools and may have interested students and residents lined up years in advance of possible openings. These recruiters feel that some of the special funding for physician recruiting could be used effectively at the area office level to support more recruiter time and travel, administrative functions, and contracts with local Indian firms. Successful implementation of the overall IHS recruiting plan, especially the placement of increased numbers of medical clerkships and residents in IHS programs, will require greater participation by clinical staff throughout IHS. Area office and service unit staff therefore need to be closely involved in all recruiting activities.

While physicians are the core of IHS clinical staff and the focus of IHS's current recruiting plans, IHS also needs to recruit other types of health manpower. Although it may not be generally accepted in IHS headquarters, some area office and headquarters staff are increasingly concerned about difficulties in recruiting adequate numbers of appropriately trained nurses. The problems of nurse recruitment and retention are particularly severe in the Aberdeen and Navajo areas (56). Service unit directors in the Navajo area cite nurse recruitment as a major management problem, because nurse staffing affects physician recruiting (6). In spite of somewhat improved nurse retention, the headquarters nursing services branch has stated that it is becoming more difficult to recruit nurses through the usual advertising approaches. This is due in part to IHS's demand for better qualified nurses (IHS prefers to hire baccalaureate nurses with at least a year of experience), and in part to the relative decline of nursing as a profession, because better-paying alternative careers now are available for women. It was expected that Medicare diagnosis related group rates (DRGs) would force reductions in hospital nursing staff, which in fact has happened; but those reductions did not ease nurse recruiting for IHS (64). Therefore, the expanded physician recruiting activites should be coordinated whenever possible with needs to recruit nurses and other health professionals.

Some IHS officials believe IHS traditionally has employed more professionals, relative to support staff, than is the norm in the private sector. This can be a problem, because when physicians lack adequate support they are likely to be less efficient, as well as less satisfied with their work (32,18). At present, clinical directors in the IHS area offices and service units have considerable flexibility to determine the mix and use of different types of staff. IHS could review ratios of professional to support staff, by profession and IHS area, and recommend appropriate ratios of support staff. It also might be useful to identify the particular types of support staff that are in short supply, and whose increased numbers would contribute to greater overall productivity. The use of physician assistants in IHS, which has not increased, is another possible area for in-house review. Although physician assistants are not suitable for all IHS locations, and it is time-consuming for IHS physicians to develop protocols and monitor their work, as IHS loses physicians the use of physician assistants may become increasingly important to health care delivery.

Finally, the IHS physician recruiting plan directs more activities to identifying and hiring new voluntary physicians for the system, than to retaining those already on board. The new out-of-service residency training program, which will sponsor 25 physicians annually in return for obligated service, and which will give preference to physicians already employed by IHS, should be an incentive for physician retention. Beyond that program, there are only two retention proposals: an increased annual continuing medical education allowance, which has been funded; and the proposal that DHHS authorize IHS to pay a 6 percent salary bonus to Commissioned Corps physicians willing to serve in difficult locations. Whether a 6 percent bonus would be sufficient incentive to service in locations where the pay could buy little in the way of amenities may be debated, and in any case the bonus would require DHHS approval.

It was beyond the scope of this study to review all the factors that can affect the retention of health professionals in isolated rural settings. Special studies of IHS physician (107,108) and nurse retention (105) have found that staff leave IHS not only because of the gap between IHS and private salaries, but also because of work conditions and family living circumstances. Many of the social and cultural limitations of isolated rural living are not readily overcome. However, tribal governments need to recognize that it is in the best interests of their communities to make life comfortable for outsiders who staff IHS facilities. In areas where tribes are taking an active role in recruiting and retention activities, there is evidence of success.

What IHS can do to improve community living conditions is limited both by its health care mission and by its funding. Community development is the responsibility of the Bureau of Indian Affairs in the Department of the Interior. IHS is responsible, however, for providing living quarters for staff in many locations, and it is well known that quarters often are inadequate both in number and in quality. Improving IHS staff quarters is the responsibility of the IHS facility construction program and, given current budget limitations, it is unlikely that great improvements can be expected in this area. For this reason, it is all the more important for the tribes to do everything possible to make decent housing available as a means of recruiting and retaining IHS staff.

The most recent survey of reasons that nurses leave IHS revealed that fear of personal assault, both physical and verbal, was a factor for many nurses who chose to leave. Twenty percent of the IHS nurses surveyed said they had been physically assaulted either at work or while traveling to work; and 38 percent had been verbally abused (105). This is a serious concern for IHS, which is responsible for ensuring employee and patient security in its facilities and programs; but again, the local communities must contribute to the solution (16).

EXTERNAL FACTORS AFFECTING PHYSICIAN RECRUITMENT

The Administration's justification for phasing out the NHSC scholarship program is that the growing surplus of physicians in the U.S. will lead to their geographic diffusion to presently underserved rural sites, such as those in IHS. Much is being written about the extent of this physician surplus and its likely effects, and since 1980 there has been considerable congressional attention to these issues and to Federal health manpower training programs (81,82). It is difficult to predict with certainty what the consequences of a physician surplus will be, because several unknown factors are involved in defining the situation: e.g., how many physicians will be available, when, and in what specialties; what number of physicians constitutes a "surplus", in what specialties and geographic areas; what types of practices will these physicians be looking for; and what types of geographic areas are likely to be attractive to these physicians. In the immediate future, when IHS physician shortages already may be severe, it is not likely that the increased supply of physicians nationally will significantly improve IHS recruiting.

Current estimates of the size of the physician surplus vary. The DHHS- chartered Graduate Medical Education National Advisory Committee (GMENAC) was among the first to project a future surplus of physicians in its 1980 report. At that time, the GMENAC predicted that there would be an excess of 70,000 physicians by 1990 and of 145,000 by the year 2000. Using a different methodology, another DHHS study projected an excess of 35,300 physicians in 1990 and 51,8000 in 2000. According to DHHS, there were 152 non-Federal physicians per 100,000 civilians in 1970, and 199 per 100,000 in 1981; DHHS projects 235 per 100,000 in 1990 and 260 per 100,000 in 2000 (36). In a recent reassessment of the GMENAC findings, the committee's chairman stated that the surpluses predicted by GMENAC in 1980 still were generally valid and in fact might understate the extent of the oversupply, due to the growth in prepaid health programs that utilize fewer physicians (76).

Other observers have come to similar conclusions regarding the GMENAC projections. Donald Steinwachs and colleagues "compared staffing patterns in primary care specialties in three large HMOs [health maintenance organizations] with the GMENAC's projections and concluded that, because of the proliferation of HMOs, 20 percent fewer primary care physicians will be needed for children and 50 percent fewer for adults in 1990 than projected by the GMENAC" (72). Another factor is the decline in hospital admissions following implementation of Medicare's prospective payment system and the expectation that by the mid-1990s, "there may be as many as one-quarter to one-third fewer patients hospitalized for every active physician". Since the average physician earns half his income from hospital practice, this would have a severe financial impact, especially on newly-trained physicians with substantial educational debts (67).

The future distribution of physicians by medical specialty also should be considered in estimating the effects of the physician surplus. The GMENAC study found that most specialties would be in surplus by 1990, although primary care physicians in general practice, family practice, general internal medicine, and general pediatrics were expected to be in approximate balance with demand (44).

In 1970, U.S. primary care physicians (general and family practice, internal medicine, and pediatrics) represented 38 percent of total physicians, which was a decline from earlier years. During the 1970s, there was considerable Federal support for family medicine programs. A survey conducted in 1980 by the American Academy of Family Physicians (which included 70 percent of the family physicians who completed their training in 1977, 1978, or 1979) found that 35 percent of the respondents were practicing in nonmetropolitan counties, and nearly 9 percent were in rural counties (95). By 1982, about 2,000 new family practitioners were entering practice each year, and half of these were locating in towns of less than 30,000 people. Primary care physicians increased from 57 to 73 per 100,000 population between 1965 and 1980 (48). Nonetheless, between 1970 and 1979 the rate of growth in primary care physicians was below that for all physicians, and DHHS in its "Fifth Report to the President and Congress on the Status of Health Personnel in the United States" (94) confirmed that little or no growth had been achieved since 1970 in the proportion of primary care physicians relative to medical specialists. Increases in numbers of family practice physicians nationwide were largely offset by declines in general practitioners, and in 1980 there was no evidence that these family practice and general physicians were diffusing into smaller towns to the extent that many specialists were (95). The continuing trend to specialty medicine runs counter to the increasing demand for family practitioners in U.S. hospitals and expanding group practices, as well as in IHS. A survey for Hospitals magazine, reported in May 1986, found that family practitioners are the type of physician most in demand in most parts of the country and in hospitals of all sizes (65).

In the 1960s, growth in the total number of physicians did not improve geographic distribution, and that was, in part, why the NHSC was established in the 1970s (29). Physicians have become more widely dispersed geographically since the early 1970s. Based on several studies of physician location, some researchers are convinced that economic theories operate and physicians will tend to locate where their incomes will be higher. Three studies by the Rand Corporation in the early 1980s substantiated that finding (54,69,114). One of the studies reported that 98 percent of people living in towns of less than 25,000 were within 25 miles of a physician (114).

Jack Hadley of the Urban Institute stated in Senate hearings (April 1981) that after adjusting for differences in the cost of living, during the period 1971 through 1978 physicians in nonmetropolitan counties earned 18 percent more than physicians in larger metropolitan counties. While communities in counties of all sizes gained physicians relative to population (U.S. rural populations have been declining), the largest relative gains were made in the smaller metropolitan counties; in rural counties with populations below 25,000, the gains were very small (29). The "Fifth Report to the President and Congress on the Status of Health Personnel in the United States" concluded (94):

> Some evidence indicates that the increased supply of physicians has improved their geographic distribution, in that a larger proportion of the younger physicians are locating outside of the most highly populated areas. However, the total number of newly trained physicians establishing practice in rural areas is still comparatively small".

In terms of the geographic locations new physicians are likely to select during the coming 10 years, there is evidence of continuing dispersion from the well-served metropolitan and suburban areas. The Bureau of Health Professions in DHHS reported in 1983 that growing proportions of young physicians (under 35 years) were locating in the more rural counties, i.e., those with fewer than 25,000 population (95). One study cited by the Bureau of Health Professions found notable differences in the location patterns of NHSC and private sector physicians: 70 percent of the NHSC physicians studied, compared with only 38 percent of the private physicians, located in towns of less than 2,500 residents (45).

The practice patterns of NHSC physicians have been analyzed extensively for DHHS by Mathematica Policy Research, Inc., and reported recently in "Young Physicians in Rural Areas: The Impact of Service in the National Health Service Corps" (97,98). The study consisted of two parts, an analysis of the characteristics of counties that did and did not attract new physicians, and a survey of physicians who graduated between 1974 and 1978 and who chose primary care practice in rural communities. The major findings were that the county characteristics most attractive to new physicians were a relatively large population, more health resources (including other physicians), the presence of a college, greater white collar employment, and less farm population.

Compared with other physicians, however, the NHSC alumni chose counties that had lower population densities, were less likely to have a hospital, and were more likely to be designated as health manpower shortage areas. Of the NHSC alumni who located in rural areas after completing their NHSC service, over 70 percent remained in the sites where they had worked before. The researchers cited this as evidence that the NHSC experience itself had a strong effect on subsequent practice location decisions, as did organized community recruitment efforts. The study also found that NHSC alumni were more accessible to the underserved, by seeing more Medicaid patients, using sliding scale fees and discounts more frequently, and accepting Medicare assignment (97). This research did not consider separately the practice location choices of NHSC physicians who served in IHS. The finding that 70 percent of all NHSC physicians who established rural private practices did so in the location where they had completed their NHSC service is far greater than the estimated 5 percent retention rate for NHSC physicians in IHS. This may be due to the fact that NHSC physicians cannot establish private practices on most reservations, although they could locate on nonreservation land nearby. To remain at their NHSC locations in IHS, they most likely would have to remain IHS employees.

HOW EXTERNAL FACTORS MAY AFFECT IHS PHYSICIAN RECRUITING

Evidence on the geographic diffusion of physicians seems clear: the larger rural counties, especially those adjacent to metropolitan areas, are gaining physicians in a wide range of specialties. This trend could ease recruiting for IHS in locations similar to these counties that are becoming desirable physician practice sites. A DHHS study reported that "minority health care providers are more likely than non-minority practitioners to practice in predominately minority and underserved communities" (96). Although numbers of American Indian physicians are very small, the DHHS study indicated that they are concentrated in the South and West, as are Indian populations. On the other hand, many IHS sites are extremely isolated and may never be desirable in terms of the social, educational, cultural, and recreational attributes that new physicians seek. It cannot be expected, therefore, that diffusion of a growing supply of physicians in the U.S. will solve IHS's recruiting problems.

Another factor that affects IHS recruiting both positively and negatively is the trend toward organized group practices in the U.S. Recent data from the American Medical Association indicate that between 1983 and 1985, "the overall percentage of employed physicians increased from 23.4 percent to 25.7 percent" (66). Reasons cited for this growth are the expansion of alternative delivery systems, increasing competition among physicians caused in part by their larger numbers, and a desire for financial security especially among younger physicians (66). The growth of HMOs and other alternative delivery arrangements, such as networks of independent office-based physicians, has increased physician acceptance of organized salaried practice. At the same time, however, this rapid growth has intensified competition for organized practice physicians. Competition is particularly keen in the recruitment of family practice physicians, who are preferred as primary care providers in these organizations. Family practice physicians also are preferred by IHS hospitals and clinics. IHS estimates that it could employ at least 5 percent of the total output of U.S. family practice residency programs each year (61). IHS recruiters observe that there always has been a group of physicians interested in organized practice settings, and in the past IHS was one of relatively few such settings available. Now, however, IHS is competing for these physicians with national organizations such as the Humana Corporation and Kaiser-Permanente, in addition to smaller local groups.

IHS officials state that for a board-certified physician coming out of a 3-year residency program, IHS is able to offer a starting salary of about $45,000 a year (32,34). In some parts of the country, this salary competes favorably; but elsewhere, even in rural communities, other organizations may offer $60,000 and up. It would be difficult for the Federal Government to compete with the private sector for physicians strictly on the basis of salaries. In fact, the current IHS recruiting plan makes little mention of direct financial incentives for recruitment. IHS can offer some advantages over independent private practice, such as no initial investment to buy or establish a practice, and malpractice insurance covered by the Federal Government. But other organized group practices can match those conditions, and pay more in salary and benefits as well.

These external factors are not likely to eliminate the need for immediate implementation of the IHS physician recruiting plan. The range of activities included in that plan should provide a good basis for increased IHS recruiting success in the future. IHS also could coordinate its efforts with private organizations that are involved in training and recruiting Indian health professionals, such as the Association of American Indian Physicians, which administers a scholarship program funded by a grant from the Pew Foundation (40). In addition, IHS may want to reevaluate carefully all other potential sources of health manpower, including those noted below.

The Department of Defense health care systems, including the Civilian Health and Medical Program of the Uniformed Services (CHAMPUS), are converting to greater reliance on private health providers instead of direct Federal employees. Physicians and nurses now in the military systems, therefore, might be recruited by IHS (40). IHS nurse recruiters already target military nurses as a source, because military nurses can transfer their benefits (especially retirement) to IHS as Commissioned Corps officers, and in IHS they are less subject to relocation than in the military (64,55).

Foreign medical graduates are a source of physicians that has not as yet been tapped by IHS. Although many foreign medical graduates responded to the NHSC/IHS advertising campaign in summer 1985, most were ineligible for IHS employment because they lacked U.S. permanent residency status and, in some cases, appropriate certification and licensing. U.S. citizenship is required for Commissioned Corps membership, and although it is not an absolute requirement in the civil service, lack of citizenship makes hiring more difficult (21). IHS does employ some foreign medical graduates who have permanent resident status, however, and could determine if special means might be developed to hire more foreign medical graduates, if they are appropriately trained for IHS work.

As noted earlier, the use of physician assistants in IHS is not growing, primarily because of the extent of physician supervision that is required. In small programs with few staff, a physician is a more versatile provider than a physician assistant; and the isolation of some IHS sites makes monitoring physician assistants especially difficult. IHS prefers to hire physicians, rather than physician assistants, when they are available; but if IHS begins to lose physicians, it would be worthwhile to analyze IHS service delivery systems to identify positions that could be filled by physician assistants. If there is a surplus of physicians nationally, physician assistants should continue to be available at relatively low cost.

IHS will need legislation and funding support from Congress to fully implement its health manpower recruiting plans. The need for authority to pay travel expenses for the spouses of prospective physician recruits visiting IHS sites was pointed out repeatedly by IHS recruiters. Although it is not likely that IHS will be able to compete with private physician recruiters in terms of expenditures per recruit (the private sector spends between $20,000 and $30,000 per physician recruited, compared with an estimated $12,000 per physician recruited in IHS), funding for spouse travel would be one relatively inexpensive contribution to a more professional IHS recruiting program (20).

The most important recruiting option, which would require special legislation and appropriations, is the loan repayment program that is being considered to replace the NHSC scholarship program as a source of service-obligated physicians. A loan repayment program could help recruit all types of health professionals, depending on need, in addition to the expected focus on physicians. The basic administrative structure of the loan repayment program has not been thoroughly debated. How much educational debt would be assumed, for example, for each year of obligated service? How would the loan repayment value relate to the physician's salary, and to the salaries of other IHS physicians? If a NHSC-administered loan repayment program is not enacted, IHS might evaluate the possibility of expanding its new out-of-service residency program to offer residencies to more non-IHS physicians, in order to recruit them for obligated service. With adequate funding (probably requiring congressional approval for funds reprogramming), this program could become a valuable source of new family practice and other physicians in IHS.

In conclusion, the net effects of current growth in the U.S. physician supply and changes in physician practice patterns may not have the same consequences for IHS as for the private sector. These factors may make IHS employment more attractive; but increased recruiting appeal may not be experienced in all IHS areas and service units. The need to make special provision for physician coverage in IHS's difficult-to-fill locations is not likely to diminish, and the options for filling such positions seem limited either to buying physicians with incentive salary packages, or to requiring obligated service in exchange for scholarships or educational loans.

CHAPTER 4:

THE ROLE OF THE NATIONAL HEALTH SERVICE CORPS IN THE INDIAN HEALTH SERVICE

The single most important source of physician recruits to the Indian Health Service (IHS) in the 1980s has been the National Health Service Corps (NHSC). By the late 1970s, the NHSC began to fill the need for new physicians in IHS left by the end of the doctor draft in 1973. From 1980 through 1983, 80 to 90 physicians, 10 dentists, and 40 to 50 nurses were recruited annually to IHS from the NHSC (22). From 1984 through 1986, when NHSC graduates were available in peak numbers, IHS filled from 130 to 150 physician vacancies annually with NHSC scholars obligated to 1 to 4 years of service. The remaining 50 of the approximately 200 new physicians needed each year have been recruited on a voluntary basis by IHS headquarters and area office physician recruiters. IHS would prefer an entirely voluntary staff, instead of relying on obligated NHSC scholars. For one thing, NHSC physicians rarely stay on with IHS after their service obligation is completed (only about 5 percent stay at least one additional year) (26). It is clear, however, that the present IHS recruiting program would have great difficulty meeting its physician goals without the availability of NHSC physicians, and this supply will be dramatically reduced in 1988 and thereafter.

NHSC APPROPRIATIONS AND STRENGTH

Table 8 presents figures on appropriations to the NHSC field placement and scholarship programs since 1972. There was rapid growth from 1972 until 1982 in appropriations for the field placement program, with corresponding growth in NHSC field strength: the number of NHSC professionals serving in health manpower shortage areas increased from 181 volunteers in 1972 to a field strength estimated at 3,300 in fall 1986 (49). Funding for the field program, only $12.5 million in fiscal year 1972, peaked at $95 million in

Table 8.--National Health Service Corps (NHSC) Field Placement and Scholarship Programs, Appropriations and Participants, Fiscal Years 1971-1986

Fiscal Year	NHSC Field Program		NHSC Scholarship Program			
	Appropriation ($000)	Year-End Field Strength	Appropriation ($000)	Awards		
				New	Continuation	Total
1971	$ 3,000	20	-	-	-	-
1972	12,574	181	-	-	-	-
1973	11,000	330	-	-	-	-
1974	9,787	405	$ 3,000	372	0	372
1975	14,055	488	22,500	1,499	365	1,864
1976	23,662	600	22,500	874	1,678	2,552
1976 Transition Quarter	---	---	22,500	885	1,764	2,649
1977	24,354	690	40,000	2,092	1,481	3,573
1978	39,696	1,425[1]	60,000	3,150	1,907	5,057
1979	62,969	1,826	75,000	2,380	4,029	6,409
1980	74,075	2,080	79,500	1,772	4,387	6,159
1981	84,739	2,338	63,400	162	4,175	4,337
1982	95,078	2,782	42,500	160[2]	2,289	2,449
1983	93,391	2,865	15,458	144[2]	793	937
1984	91,000	2,609	6,300	69[2]	98	167
1985	75,000	2,958	2,300	37[2]	12	49
1986[3] (est.)	$ 58,500	3,304	$ 2,201	35[2](est.)	7 (est.)	42 (est.)

[1] From 1971 through 1978, all NHSC field placements were federally funded. Since 1979, there has been a transition away from Federal field positions to private practice assignment (PPA) and private practice option (PPO) positions. In 1986, only 17 percent of the NHSC field positions (including IHS) were federally funded; 62 percent were PPA; and 21 percent were PPO.

[2] Multi-year awards.

[3] Fiscal year 1986 as of August 1986.

SOURCE: U.S. DHHS, PHS, HRSA, NHSC, "NHSC Notes", Vol. IX. No. 2 Special Issue, September 1986.

1982 before declining to the current level, an estimated $58.5 million in 1986.

NHSC scholarships first were awarded in fiscal year 1974, supporting 372 students with an appropriation of $3 million (see table 8). The largest numbers of scholars were supported from 1978 through 1981, when an average of 5,500 new and continuation awards were made annually from appropriations ranging from $60 to $80 million. Since 1980, however, funding for NHSC scholarships has fallen to only $2.3 million in 1986 ($2.2 after the application of Gramm-Rudman cuts). Only 35 to 50 new and continuation scholarships for students with exceptional financial hardship now are being funded annually.

The numbers of NHSC scholars newly available for placement each year, with the numbers of service payback years owed, are presented in table 9 for 1977 through 1986 with projections for 1987 through 1992 (note that new placements are not equivalent to total field strength) (93). These figures represent the best information available to the NHSC headquarters office at the end of March 1986. Projections for future years, however, should be viewed only as approximations. The numbers are revised constantly as scholars change their plans, obtain special deferrments, and move in and out of default status for any number of reasons. Since recent court cases have upheld a triple penalty to buy out a NHSC obligation, nearly 100 former defaulters have begun service assignments (90). Nonetheless, it is clear that new placements peaked in 1984-86, and the decline of NHSC scholars as a significant source of health manpower will be rapid after 1987.

The numbers of NHSC scholars placed in IHS and tribal health programs since 1980 are summarized below:

Fiscal Year of Availability	Total NHSC scholars (all professions) placed in IHS
1981	126
1982	132
1983	159
1984	147
1985	123

About 76 percent of the individuals in this table were physicians and most of the remainder

Table 9.--Numbers of National Health Service Corps Recipients, by Years of Training and Years of Obligated Service Due, All Disciplines, as of March 31, 1986

Obligated Service Years Due	Total	Year Due On Active Duty 1977	1978	1979	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	Unknown
Total	8,606	124	324	392	496	477	465	680	1,174	1,408	1,310	996	442	179	89	44	2	4
1																		
2	3,176	102	239	325	389	283	253	108	425	438	288	172	97	40	13	4		
3	3,185	22	85	59	106	178	113	423	504	519	480	347	149	88	72	39	1	
4	2,238			8	1	16	99	149	245	451	541	476	195	51	4	1	1	
5																		
6																		
More than 6	3																	3
Unknown	4										1	1	1					1

SOURCE: U.S. DHHS, PHS, HRSA, National Health Service Corps, 1986.

were nurses. These figures, reported by the NHSC headquarters office from program files, do not necessarily agree with those reported by other sources (11). For example, an IHS source reported that 155 NHSC physicians (plus 22 nurses and 8 dentists, for a total of 185) joined IHS in fiscal year 1984 (109). A different NHSC source in February 1986 said IHS had recruited 142 NHSC physicians to begin service in summer 1986 (38). A printout provided by the IHS physician recruiting office listed 111 NHSC scholars actually on duty in IHS hospitals and clinics as of July 13, 1986, of which 106 were physicians and 5 were nurses (91). More NHSC physicians and nurses were expected in IHS placements before the end of the summer.

It is apparent that consistent, reliable figures on total numbers of NHSC service-obligated scholars and on the numbers of those scholars who have served in IHS are not easy to obtain. Once a NHSC scholar is placed in IHS, he or she becomes an IHS employee and so is dropped from NHSC follow-up; at the same time, IHS treats the NHSC scholar as any other recruit, and keeps no special records. No one denies, however, that the NHSC is IHS's main source of medical staff, providing as it does 130 to 150 new physicians annually. NHSC obligated physicians are estimated to represent about 45 to 50 percent of the total IHS physician force of 700 to 750 (of whom 650 to 700 are primarily in clinical practice), and 60 percent of the new physician recruits in recent years (24,34,51,92).

HISTORY OF THE NHSC

The NHSC was established in 1970 (Public Law 91-623, the Emergency Health Personnel Act) as part of the Federal Government's response to an evident shortage and maldistribution of medical personnel. Initially a program for placing volunteer physicians in medically underserved areas, the NHSC expanded in 1972 (Public Law 92-585) by adding a health manpower scholarship component designed to produce obligated professionals to staff its field program. The scholarships have provided tuition and living stipends, primarily to medical students, in exchange for commitments to work for 1 to 4 years in a NHSC-approved health manpower shortage area. NHSC awards are made strictly on the basis of 1 year of obligated service for 1 year of support, with no consideration of a student's financial need and no limit on the amount of the award. (Perhaps because of the unlimited awards, a high proportion of NHSC scholars have attended expensive private medical schools. As of 1980, three of the top five medical schools chosen by NHSC scholars were specialty-oriented Washington, D.C., medical schools that lacked strong family practice programs (71)). In 1979 and 1980, the NHSC supported up to 6,400 students annually, which resulted in peak crops of service-obligated NHSC scholars in 1984, 1985, and 1986 (from 1,200 to 1,400 scholars each year, most of them physicians; see tables 8 and 9).

Health manpower shortage areas are determined by criteria in Public Health Service (PHS) regulations that automatically designate groups of members of federally recognized tribes (as defined in section 4(d) of the Indian Health Care Improvement Act) as eligible for NHSC placements. This means that all IHS service units, whether operated by IHS or by tribes, are eligible for NHSC assignees. Groups of Indians who are not reservation-based members of federally recognized tribes, but who meet other criteria of being Indian, may be designated as health manpower shortage areas or populations if they meet criteria applicable to non-Indian medically underserved populations (i.e., detailed criteria sets in 42 CFR Part 5 app. A, involving geography, population characteristics, availability of physicians and facilities, and other factors). Some urban Indian health projects and some tribally operated programs have not been eligible for NHSC obligated providers because of difficulties in meeting those criteria. On the other hand, it is likely that NHSC scholars in private practice settings in some medically underserved areas may provide services to Indians along with other populations.

A health manpower shortage area (HMSA) may be either rural or urban; generally, 70 percent of the sites have been located in rural areas, with 30 percent in urban areas. Due to problems with data consistency and jurisdictional questions, shortage area designations have not been an entirely satisfactory method of identifying the most medically needy locations in the country. An evaluation of the HMSA designation process in 1983 resulted in a controversial reduction in approved sites from 2,100 to 1,700. At the same time, NHSC sites with guaranteed Federal salaries (as opposed to those paid by community organizations) were cut by 40 to 50 percent. When peak numbers of scholars sought placements between 1984 and 1986, there were fewer sites to choose from, and there were complaints that NHSC was forcing its graduates into hardship locations (3). Changes in NHSC administrative policies, partly in response to fluctuating placement class sizes, also contributed to sometimes hostile relations between the NHSC and its scholars (4). NHSC officials, on the other hand, argue that a substantial number of NHSC physicians changed their minds about primary care practice, once their educations were complete, and sought to avoid service.

In recent years, the NHSC has selected from the full list of HMSAs a high priority list called the HMSA Placement Opportunity List, or "HPOL". The HPOL is updated each year and constitutes the range of potential site matches for NHSC obligated scholars. Most of the locations on annual HPOL lists are "private practice assignment" locations, that is, privately salaried positions with medical group practices or community clinics, such as the community health centers. Although these positions may be funded largely through Federal grants to the community organizations, NHSC staff assigned to those locations are not Federal employees. There are relatively few federally salaried NHSC sites now, most sites having been converted to private practice assignment or private practice option, in which the NHSC scholar may establish his or her own private practice (usually fee-for-service) sponsored by a medically underserved community organization. At the end of 1984, more than 70 percent of the locations available on the HPOL were private practice assignment or private practice option sites (88,3).

OPTIONS FOR CHANGE IN THE NHSC

Since publication of the Graduate Medical Education National Advisory Committee (GMENAC) report in 1980, along with other projections of a U.S. physician surplus, congressional and Administration views of the NHSC programs have changed. The likelihood of a physician surplus now is widely accepted, and although its magnitude and probable effects are subject to dispute, some analysts argue that the surplus eventually will result in voluntary physician diffusion to most manpower shortage locations. These possible changes have called into question the mission of the NHSC, and congressional hearing records since 1980 document intensive review of the program.

The Administration has called for elimination of the NHSC scholarship program and reduced field placements. Congress has favored a more gradual downward adjustment in NHSC activities. The Senate Committee on Labor and Human Resources proposed phasing out the NHSC scholarship program in 1981, because it was expected that the increased supply of physicians would result in increased recruitment of volunteers to underserved areas by the late 1980s. Legislation to reauthorize the NHSC has been stalled in Congress since 1984 and, as a consequence, the programs have been operating under continuing resolution.

The 99th Congress did not reauthorize the NHSC. The Senate bill (S. 1285) passed July 19, 1985; but the House version (H.R. 2237) did not pass. Both bills would have reauthorized the NHSC field placement and scholarship programs for 3 years, but there were differences in funding levels and numbers of new scholarships. The Senate bill would have allowed 150 new awards annually in fiscal years 1986, 1987, and 1988; the House bill authorized 350, 400, and 425 new awards in those years. Funding for the NHSC field placement program was included in the fiscal year 1987 DHHS appropriation at $60 million (8).

A New Loan Repayment Program

In view of the expected surplus of physicians nationally, there seems to be consensus that the NHSC scholarship program is not likely to be restored to its peak levels of the late 1970s. Funding for the field placement program probably will continue at least on a temporary basis, in order to complete placement of obligated scholars remaining in the system through the early 1990s. After that, the NHSC field program could be eliminated, or it could continue more or less as it began, by recruiting and placing volunteer health professionals in manpower shortage areas. An alternative supported by PHS would establish a loan repayment program in the NHSC as a means of recruiting obligated medical staff for the field program. The loan repayment idea is not new. Such a program was authorized in the late 1970s, but was not adequately funded and was discontinued in 1982. In 1984, the American Medical Association, the American Medical Student Association, the Association of American Medical Colleges, and other groups in the medical community supported renewal of the loan repayment program (3).

For fiscal year 1988, it appears that PHS will recommend to the Department of Health and Human Services (DHHS) that the current NHSC field placement structure be maintained and the scholarship program be replaced with a loan repayment program (87,5). The Administration's 1988 budget request does not reflect these PHS recommendations. PHS estimates that it would cost $43 million per year, plus inflation, to support the current NHSC field strength of 2,500 to 3,000 professionals (most of whom are employed under NHSC private practice and private assignment options, and thus are not directly on the Federal payroll). These field staff would provide care in the 1,900 primary care shortage areas that now are designated (87). Regardless of the Federal Government's responsibilities under NHSC legislation for training and placing medical staff in underserved areas, the need to staff IHS programs and community health centers remains.

The NHSC has not been successful in recruiting volunteers for field placement: only 28 voluntary physicians were recruited in 1985, although the target for recruiting is 200 per year (31). If the NHSC scholarship program is eliminated, PHS recommends $6 to $8 million in fiscal year 1988 to fund 150 to 200 loan repayment agreements with second-and third-year medical residents. The Federal Government would repay part of the educational loans of selected health professionals in exchange for obligated service (minimum 2-year assignments) in manpower shortage areas. With the increasing average indebtedness of medical students, this program that would repay $15,000 in loans for each year of service could provide real incentive (5). According to data from the Association of American Medical

Colleges, the average indebtedness of students upon graduation from medical school has escalated sharply since 1980, and in 1985 ranged from $26,000 at public schools to over $36,000 at private schools (35). The Association of American Medical Colleges found that nearly 90 percent of medical school seniors graduated with debt in 1985, and that debt averaged $30,000 each, compared with average indebtedness of about $20,000 in 1981, when only 77 percent of the graduates had debt (43).

PHS officials and IHS physician recruiters see a major advantage of a loan repayment program in the ability to select the numbers and types of specialists needed at the time they are needed, rather than attempting to project medical specialty needs 7 years into the future as the basis for scholarship awards. The long timespan between initial scholarship award and completion of a medical residency program has resulted in changed educational objectives for some students, including completion of specialties that cannot be used effectively in a health manpower shortage area setting. A relatively high percent of NHSC students have defaulted on their service obligations. Estimates of NHSC default rates, which admittedly reflect a wide range of administrative situations in addition to deliberate evasion of payback responsibilities, are in the range of 10 to 15 percent of all scholarship recipients (88,89,39,31). For comparison, the default rate on Federal Health Education Assistance Loans (HEAL), as of September 1984, was only about 4 percent of all recipients and 3.1 percent of medical students (35).

For these and other reasons, the PHS proposal to replace NHSC scholarships with a NHSC loan repayment program may receive favorable consideration. If loan repayment is considered, it could be made available to other hard to recruit professionals, such as nurses, in addition to its primary role in recruiting physicians.

Other Options

A matching grant system for sharing Federal and State financial responsibilities for meeting the needs of health manpower shortage areas is another option reviewed by PHS that would allow elimination of both the NHSC field and scholarship programs. The Federal Government could either match an average 50 percent of total costs, with variations by State according to relative State need, or it could pay 100 percent of costs above a certain threshold. This approach would give the States more flexibility (and responsibility) in addressing their particular health manpower needs (87).

Another option outlined in the PHS policy paper would eliminate the NHSC field and scholarship programs by 1992, while possibly retaining a Federal clearinghouse function to help match volunteer medical professionals with underserved communities. IHS and community health centers would be responsible for recruiting their own clinical staff, using their present voluntary mechanisms, the proposed loan repayment program, salary enhancements for less desirable locations, and other incentives as recruiting tools. The recruiting potential of the PHS Commissioned Corps is discussed in chapter 5 of this report; in brief, the Corps offers benefits (especially, full retirement after 20 years of service) and a professional career system that appeal to some potential recruits. The PHS option paper assumes that the ability to reassign Commissioned Corps officers will provide coverage for the less desirable practice locations in IHS and elsewhere.

Whatever the future of the NHSC may be, it is clear that IHS will face a major disruption in its main source of new physicians beginning in 1988. Although total numbers of new scholars available from 1984 through 1986 ranged from 1,200 to 1,400 per year, and nearly 1,000 scholars are expected to be placed in 1987 (of these, about 750 are primary care physicians) (51), the NHSC headquarters office projects that those figures will drop precipitously in 1988. By 1992, there will be effectively no service-obligated scholars left in the NHSC system (table 9). Current expectations are that IHS may get 120 to 125 of the approximately 1,000 NHSC scholars who will be available in 1987 (51). Even should IHS continue to enjoy preferential access to NHSC obligated scholars, as it has in recent years, and even should the very last available NHSC physician be placed in IHS (as some NHSC officials have suggested might well be the case), it still will leave IHS with only negligible physician recruiting assistance from NHSC after 1988.

CHAPTER 5:

THE PUBLIC HEALTH SERVICE COMMISSIONED CORPS IN THE INDIAN HEALTH SERVICE

The U.S. Public Health Service (PHS) was created in 1789 to carry out Federal responsibilities for quarantine services, epidemic control, and the health of merchant seamen. A career system for health professionals in PHS, the Commissioned Corps, was established in 1889. In more recent times, the PHS Commissioned Corps has been recognized in statute as one of the nation's seven uniformed services (the others are the Army, Navy, Air Force, Marines, Coast Guard, and the National Oceanic and Atmospheric Administration Corps). As such, the PHS Commissioned Corps follows the military model in its rank and benefits systems, and is subject to mobilization in case of national emergency.

The PHS Commissioned Corps has a strong constituency both within the Department of Health and Human Services (DHHS), where Commissioned Corps officers hold a number of high-level positions, and outside DHHS in an active Commissioned Officers Association and in Congress. The strength of this constituency has been demonstrated by the resistance mounted since 1980 to efforts by the Office of Management and Budget (OMB) to eliminate the Corps (OMB efforts to eliminate the Corps in fact date from the late 1960s).

Whether the PHS Commissioned Corps is a costly anachronism, as argued by OMB, or a valuable means of recruiting and retaining needed health professionals for public service, or both, is a question that cannot be fully answered here. The main issues in the debate about the Commissioned Corps in the Indian Health Service (IHS) and other PHS agencies are, first, whether the Corps is or is not a more expensive means of staffing health professional positions than the Federal civil service; and second, whether the special benefits Corps officers enjoy are justified by their special uses. Corps mobility to meet national health emergencies (such as the influx of Cuban refugees during the Mariel boat lift) and to serve in isolated locations such as Indian reservations is the special feature most often cited to justify benefits comparable to those received by military officers. In the context of these issues, the focus of this chapter is on how well the Commissioned Corps serves the clinical staffing needs of IHS.

RECENT STUDIES OF THE PHS COMMISSIONED CORPS

OMB's charges about the high costs of the Commissioned Corps, relative to those of the Federal civil service system, resulted in an analysis by DHHS's Office of the Assistant Secretary for Planning and Evaluation using fiscal year 1981 data. The results of that analysis (completed in November 1981) were submitted with testimony before the Subcommittee on Health and the Environment of the House Committee on Energy and Commerce in June, 1982 (78). That analysis apparently justified the DHHS decision not to eliminate the Commissioned Corps, and was the basis of negotiations between the Secretary of DHHS and the Director of OMB that resulted in a cap on the number of career (regular) Corps officers and stricter controls on the recruitment of new Corps officers (85).

The results of the DHHS analysis, however, were open to interpretation: whether the Commissioned Corps cost more to operate than a comparable group of civil service employees depended on just what costs were included in the analysis, and on whether one took a long- or short-term view. A principal author of the DHHS study concluded (73):

> Depending on one's time frame and relation to the operating budget there are significantly different answers. In the short run, in terms of current budgetary cost to DHHS, keeping the Corps intact was estimated to be actually 7% cheaper than if 6,200 General Schedule or SES employees were to do the job. Excluded from current budgetary cost are the tax expenditures associated with tax free cash allowances. This "cost" is not a budgeted item and is equivalent to a Treasury subsidy. Also excluded is the unfunded liability of future retirement costs. The government does not set aside money in a trust fund for the standard component of the Corps' future retirement cost. In the long run, when the present value of future retirement benefits and value of tax expenditures associated with tax-free allowances are taken into consideration, the Corps turns out to be roughly 7% more expensive.

The results of the 1981 cost comparison were changed substantially by Federal pay increases effective in 1982. The revised 1982 cost analysis found the civil service to be less expensive than the Commissioned Corps (how much less depended, again, on which cost categories were included), because civil service pay increased by 4.8 percent, while pay to the military, including the PHS Commissioned Corps, increased by 14.3 percent. It was estimated that in fiscal year 1982, if long-term costs were included, the Commissioned Corps would cost 14 percent more to operate than a comparable civil service force (78). Current Corps budget costs excluding unfunded retirement liability, which for the Corps were 4.6 percent less than for the civil service in 1981, exceeded civil service costs by 4.8 percent in fiscal year 1982. When both unfunded retirement liability and Commissioned Corps tax subsidies were excluded, the costs of the two systems were virtually the same.

Due largely to the 1981 closure of the PHS hospital system for Coast Guard and merchant seamen, the Commissioned Corps was reduced from a force of 6,900 officers on active duty on October 1, 1981, to 6,214 on December 31, 1981. This reduction reflected a loss of reserve officers who had not completed their 3-year probationary period, and the resignations of officers who chose not to accept reassignment. Table 10 shows that regular plus reserve Commissioned Corps strength fell from 7,204 on September 30, 1980, to 6,955 in September 1981 and to 5,840 at the end of fiscal year 1982. The force has averaged about 5,400 since that time.

DHHS has not attempted to analyze whether the Commissioned Corps is worth additional costs on the basis of its usefulness and effectiveness. To what extent, for example, are the special features of the Corps -- recruitment potential, retention, mobility, flexibility, career development, reserve capacity -- actually needed and used in DHHS programs? What about the inequities that may arise when Corps and civil service staff doing the same work receive different salaries and benefits? Are Corps officers, in fact, relocated to staff isolated sites and respond to national health emergencies more frequently than civil servants? Unfortunately, data and research to answer these questions are quite limited.

A review of special pay incentives used to recruit and retain Commissioned Corps and civilian physicians, performed by the DHHS Office of the Inspector General, was reported

Table 10.--PHS Commissioned Corps, by Agency, with Percent Regular Corps,
Fiscal Years 1980-1986

Agency	1980		1981		1982[1]		1983		1984		1985		1986	
	Total No.	Percent Regular	Total No.	Percent Regular	Total No.	Percent Regular	Total No.	Percent Regular	Total No.	Percent Regular	Total No.	Percent Regular	Total No.	Percent Regular
PHS Commissioned Corps: Total	7,204	31.0%	6,955	31.5%	5,840	36.3%	5,637	36.5%	5,410	41.9%	5,345	41.2%	5,468	39.4%
Health Resources and Services Administration	4,394	23.7	4,231	24.4	3,346	27.5	3,176	28.0	2,960	33.2	3,008	34.9	3,116	32.9
(Indian Health Service)	(1,887)	NA	(1,914)	NA	(1,884)	NA	(1,933)	NA	(2,064)	NA	(2,123)	NA	(2,240)	NA
Health Resources Administration	72	54.2	50	62.0	44	70.5	-	-	-	-	-	-	-	-
Food and Drug Administration	364	58.2	363	58.7	372	66.1	384	66.4	395	68.9	406	64.8	415	62.2
National Institutes of Health	953	27.8	911	29.3	830	36.1	779	37.7	748	42.8	727	42.2	730	40.5
Center for Disease Control	552	32.8	562	31.3	556	36.7	579	32.3	604	38.9	637	37.4	620	37.4
Alcohol, Drug Abuse, & Mental Health Administration	165	32.1	167	31.1	151	32.5	158	36.1	156	37.2	156	37.2	170	32.4
Environmental Protection Agency	295	64.4	276	65.2	259	65.6	252	65.4	248	68.5	244	70.5	242	70.2
Office of the Secretary	10	40.0	11	36.4	17	41.2	27	44.4	20	55.0	17	58.8	15	53.3
Office of the Assistant Secretary for Health	315	62.2	304	62.8	215	72.1	235	71.1	221	80.1	76	73.7	82	72.0
Health Care Financing Administration	82	57.3	80	58.8%	49	71.4	47	68.1%	57	68.4	74	67.6%	77	68.8
Other/unknown	2	50.0%	-	-	1	0.0%	-	-	1	100.0%	-	-	1	100.0%

[1] The closure of the PHS hospital system in fiscal year 1982 reduced Comissioned Corps strength, primarily among active reserve officers still in their 3-year probationary period. The hospital closures also resulted in a large number of transfers from the hospitals to other agencies and programs, including IHS.

SOURCE: U.S. DHHS, PHS, CPOD, Monthly Strength Reports (I-10), from Commissioned officer data system. All figures represent Commissioned Corps strength at the end of each fiscal year, except 1986, which reflects strength on June 30, 1986. All agencies are in the Public Health Service except the Environmental Protection Agency, the Health Care Financing Administration, and the DHHS Office of the Secretary.

in 1985. The Commissioned Corps and the civil service operate under two separate pay and bonus systems. The review concluded that if the same criteria used to determine need for special pay for civil service physicians were applied to Corps physicians, an estimated $44.5 million could be saved over 5 years. The study noted that legislation would be needed to change statutes currently authorizing special pay as an entitlement to all Corps officers. An additional savings of $6 million over 5 years was projected if special pay were disbursed to Corps physicians monthly, along with basic pay (as is done for civilian physicians), instead of in a lump sum, paid annually in advance. Finally, the Inspector General's Office recommended improved DHHS administrative practices for recovering special pay from Corps physicians who did not complete their contracts and for controlling physicians' outside private practices (86).

The 1985 Inspector General's report particularly questioned the appropriateness of retention special pay for National Health Service Corps (NHSC) physicians who were fulfilling their service obligations as members of the PHS Commissioned Corps. Statutes prohibit special retention pay to obligated NHSC physicians in the civil service system, but until recently NHSC physicians in the Commissioned Corps received the same $9,000 to $10,000 annual bonus that is paid automatically to other Corps physicians. Language in DHHS appropriations bills for fiscal years 1983-85 eliminated retention special pay to NHSC physicians in the Commissioned Corps. An exception was made for NHSC physicians in the Commissioned Corps in IHS, however, initially on the technicality that IHS is not funded from the DHHS appropriation (it is funded in the Department of the Interior), and later in specific legislation. The intent of this exception was to make Commissioned Corps salaries in IHS more nearly comparable to civil service physician pay, by using retention special pay to augment a Corps physicians' base salary (see below, in the "Issues" section of this chapter, for a comparison of Commissioned Corps and civil service physician salaries).

The Inspector General's report did not recommend elimination of the Commissioned Corps system; but it did call for efforts to correct what it identified as inequities between the

Corps and the civil service system, by modifying the Corps to conform more closely to the civil service. PHS disagreed, however, with proposals that would treat special pay and benefits for the Commissioned Corps differently from the other uniformed services.

In terms of IHS's physician recruiting needs, the Inspector General's study did not take into account the future loss of obligated NHSC physicians and the effects that loss could have on IHS staffing. The study ignored the overriding need to recruit and retain more physicians for IHS by all means available, and did not consider that differences in the two personnel systems (Commissioned Corps and civil service) might improve recruiting success. Another factor not considered in the Inspector General's study was that without the retention special pay bonus of $9,000-$10,000 a year, a new physician in the Commissioned Corps would earn substantially less than in the civil service. As a consequence, more new physicians could be expected to join the civil service; a further consequence of that choice, discussed later in this chapter, might well be higher overall IHS physician costs, because civil service physicians are paid overtime for hours worked beyond 40 per week, while Commissioned Corps physicians are not. Most physicians in IHS work more than 40 hours per week, and overtime pay therefore can be a significant expense; it could very likely exceed the relatively small savings projected by the implementing the Inspector General's recommendations.

DESCRIPTIVE DATA ON THE CORPS

Data to describe the PHS Commissioned Corps were obtained through the cooperation of the Commissioned Personnel Operating Division (CPOD), PHS, Rockville, Maryland. CPOD maintains a computerized registry of Commissioned Corps officers that is updated frequently and generates a set of reports known as the "monthly strength reports". These routine tables, plus a number of special computer runs, were the source of most data in this section (74).

As of June 30, 1986, PHS Commissioned Corps strength stood at 5,468 officers (see table 11), of which 2,156 (39.4 percent of the total Corps) were regular or career officers, 3,176 were in the active reserve (58.1 percent), and the remaining 136 were on 120-day active duty primarily in the summer medical student extern program of IHS. By far the largest group of Commissioned Corps officers (3,116 or 57 percent of all officers) served in the Health Resources and Services Administration (HRSA), which includes community health centers and migrant clinics as well as IHS. Of the total Corps, 2,240 officers (41 percent) served in IHS. Table 11 shows that other agencies employing Commissioned Corps officers were, in order of importance, the National Institutes of Health (NIH), the Centers for Disease Control (CDC), the Food and Drug Administration (FDA), the Environmental Protection Agency (EPA), the Alcohol, Drug Abuse and Mental Health Administration (ADMHA), the Office of the Assistant Secretary for Health, the Health Care Financing Administration (HCFA; only 77 officers), and the DHHS Office of the Secretary. (Note that the total number of Corps officers in HRSA, June 30, 1986, is listed as 3,116 in table 11 and 2,978 in table 12, below. The difference is 138 officers who are funded by HRSA, but who are located in PHS Regional Offices and do not necessarily work in HRSA functions. Because these tables are based on two different computer runs on the same June 30, 1986 data file, table 11 accounts the 138 officers to HRSA while table 12 does not. This factor does not affect figures for IHS, which consistently represent individuals assigned to and working in IHS.)

Eleven categories of health professionals are eligible for service in the PHS Commissioned Corps: physicians, dentists, engineers, scientists, veterinarians, dietitians, nurses, pharmacists, sanitarians, therapists, and health services officers (a general category including individuals with master's degrees in a health-related field, optometrists, and health records administrators). Table 12 shows that as of June 30, 1986, physicians formed the largest single professional group, representing 1,632 or nearly 30 percent of all Commissioned Corps officers. The second largest group was the health services officers category, followed closely by nurses and dentists. Looking at the numbers of Corps professionals serving in IHS, table 12 shows that 33 percent of all Corps physicians (539), 67 percent of the nurses, 63.5 percent of the pharmacists, and 50.5 percent of the sanitarians served in IHS.

Table 11.--PHS Commissioned Corps, by Agency
and Corps Status, June 30, 1986

Agency	Total Comm. Number	Active Corps Percent	Regular Corps[1] Number	Regular Corps[1] Percent	Active Reserve[2] Number	Active Reserve[2] Percent	Externs (< 120 days)[3] Number	Externs (< 120 days)[3] Percent
PHS Commissioned Corps: Total	5,468	100.0%	2,156	100.0%	3,176	100.0%	136	100.0%
Health Resources and Services Administration	3,116	57.0	1,024	47.4	1,993	62.7	99	72.9
(Indian Health Service)	(2,240)	(41.0% of PHS total)	(631)	(29.3% of PHS total)	(1,520)	(47.9% of PHS total)	(89)	(65.4% of PHS total)
Food and Drug Administration	415	7.6	258	12.0	150	4.7	7	5.1
National Institutes of Health	730	13.4	296	13.7	420	13.2	14	10.3
Center for Disease Control	620	11.3	232	10.8	384	12.1	4	2.9
Alcohol, Drug Abuse, and Mental Health Administration	170	3.1	55	2.6	104	3.3	11	8.1
Environmental Protection Agency	242	4.4	170	7.9	72	2.3	-	-
Office of the Secretary	15	0.3	8	0.4	7	0.2	-	-
Office of the Assistant Secretary for Health	82	1.5	59	2.7	22	0.7	1	0.7%
Health Care Financing Administration	77	1.4%	53	2.5%	24	0.8%	-	-
Other/Unknown	1	-	1	-	-	-	-	-

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[1] Regular Corps on active duty includes 4 officers in leave without pay status and 4 officers temporarily reactivated from retirement.

[2] Active reserve includes 8 officers in leave without pay status.

[3] This category, which includes individuals with active reserve appointments of no more than 120 days, reflects primarily summer externs or "COSTEPS" (Commissioned Officer Student Training Extern Program). Most of these externs are in HRSA-IHS summer placements.

SOURCE: U.S. DHHS, PHS, CPOD; data tables generated by special request on Commissioned Corps data system, file current to June 30, 1986. The total number of active Commissioned Corps officers in HRSA, 3,116, exceeds the 1986 total HRSA complement of 2,978 in tables 12 and 20. The difference of 138 officers represents HRSA-funded positions in the 10 PHS Regional Offices. These officers do not necessarily perform HRSA functions. The 2,978 HRSA officers are those who actually work for HRSA. Other agency totals in this table also include their shares of PHS Regional Office staffing.

Table 12.--PHS Commissioned Corps,
by Agency and Professional Category, June 30, 1986

Agency	Total Commissioned Corps	Professional Category										
		Physicians	Dentists	Nurses	Engineers	Scientists	Sanitarians	Veterinarians	Pharmacists	Dietitians	Therapists	Health Services Officers
Public Health Service	5,468	1,632	609	681	563	245	281	81	513	65	90	708
Health Resources and Services Administration	2,978 (54.5%)	772 (47.3%)	554 (91.0%)	524 (76.9%)	222 (39.4%)	24 (9.8%)	151 (53.7%)	- -	354 (69.0%)	25 (38.5%)	57 (63.3%)	295 (41.7%)
Indian Health Service	2,240 (41.0%)	539 (33.0%)	284 (46.6%)	459 (67.4%)	220 (39.1%)	6 (2.4%)	142 (50.5%)	- -	326 (63.5%)	22 (33.4%)	35 (38.9%)	216 (30.5%)

SOURCE: U.S. DHHS, PHS, CPOD; data tables generated by special request on Commissioned Corps data system, file of June 30, 1986. Percents (in parentheses) for HRSA and IHS represent percents of total PHS officers in each professional category. Total officers combine all regular active and active reserve Corps, including the 136 externs on duty in June 1986. As noted in table 11, the total number of Commissioned Corps officers in HRSA, 2,978, excludes the 138 officers funded by HRSA in the PHS Regional Offices who do not work on HRSA projects.

Overall Trends

Trends in PHS Commissioned Corps strength and distribution among agencies are displayed in tables 10, 13, and 14 (note that figures for fiscal year 1986 are as of June 30). Table 10 presented total Corps strength since 1980, with percent regular Corps, by agency. As noted above, total Corps strength has declined by 1,736 officers (24 percent of the 1980 force) since 1980, due in large part to closure of the PHS hospitals and the reduced need for direct patient care staff. The Corps stabilized in 1983-84 at about 5,400 officers. The regular Corps represents nearly 40 percent of all officers throughout the Corps, but its members are concentrated in EPA, FDA, the Office of the Assistant Secretary for Health, and HCFA. HRSA and IHS have relatively fewer regular or career Corps officers, primarily because most of the NHSC scholars and other new recruits who begin their service in the Corps as active reserve officers are used in those agencies. In IHS, both the number of Corps officers and IHS Corps as a percent of all Corps have increased stadily since 1980, when IHS had 26 percent of the officers. In June 1986, 41 percent of all Commissioned Corps officers, a force of 2,240, worked in IHS.

Table 13 shows trends in physician strength and placement by agency since 1980. Physicians in the Commissioned Corps have declined from 2,789 in 1980 to 1,632 in June 1986, a loss of 41 percent. Certain agencies, in particular HRSA, NIH, ADMHA, and the Office of the Assistant Secretary, have lost substantial portions of their physician Corps. IHS, however, has held steady at about 540 physicians each year since 1980, while the number of Corps physicians elsewhere in HRSA (in community health centers, especially) declined from 1,157 to only 256 (a loss of 78 percent). The loss of Corps physician positions in non-IHS HRSA reflects both the closure of PHS hospitals and the conversion of federally funded NHSC sites to private practice and community or clinic pay options. IHS currently employs 33 percent of all Commissioned Corps physicians.

Nearly all professional categories in the Corps except physicians, dentists, and

Table 13.--PHS Commissioned Corps Physicians, by Agency, Fiscal Years 1980-86

Agency	1980		1981		1982		1983		1984		1985		1986	
	No. MDs	Percent	No. MDs	Percent	No. MDs	Percent	No. MDs	Percent	No. MDs	Percent	No. MDs	Percent	No. MDs	Percent
PHS Commissioned Corps: Total	2,789	100.0%	2,549	100.0%	2,062	100.0%	1,895	100.0%	1,738	100.0%	1,679	100.0%	1,632	100.0%
Health Resources and Services Administration	1,701	61.0	1,536	60.3	1,173	56.9	1,017	53.6	864	49.7	832	49.7	795	48.7
(Indian Health Service)	(544)	(32.0% of HRSA)	(555)	(36.1% of HRSA)	(525)	(44.8% of HRSA)	(531)	(52.2% of HRSA)	(567)	(65.6% of HRSA)	(570)	(68.5% of HRSA)	(539)	(67.8% of HRSA)
Health Resources Administration	5	0.2	4	0.1	4	0.1	-	-	-	-	-	-	-	-
Food and Drug Administration	35	1.3	33	1.3	32	1.6	37	2.0	41	2.4	40	2.4	41	2.5
National Institutes of Health	615	22.0	544	21.3	449	21.8	401	21.2	381	21.9	371	22.1	373	22.9
Center for Disease Control	254	9.1	264	10.4	259	12.6	288	15.2	304	17.5	317	18.9	302	18.5
Alcohol, Drug Abuse, & Mental Health Administration	101	3.6	103	4.0	96	4.7	96	5.1	92	5.3	86	5.1	84	5.1
Environmental Protection Agency	4	0.1	4	0.2	2	0.1	2	0.1	3	0.2	2	0.1	2	0.1
Office of the Secretary	-	-	1	-	1	-	2	0.1	1	-	1	-	-	-
Office of the Assistant Secretary for Health	63	2.3	53	2.1	41	2.0	48	2.5	47	2.7	26	1.5	30	1.8
Health Care Financing Administration	10	0.4%	7	0.3%	4	0.2%	4	0.2%	5	0.3%	4	0.2%	5	0.3%
Other/unknown	1	-	-	-	1	-	-	-	-	-	-	-	-	-

SOURCE: U.S. DHHS, PHS, CPOD, Monthly Strength Reports (I-10), from Commissioned officer data system. All figures represent Commissioned Corps strength at the end of each fiscal year, except 1986, which reflects strength on June 30, 1986. All agencies are in the Public Health Service except the Environmental Protection Agency, the Health Care Financing Administration, and the DHHS Office of the Secretary.

Table 14.--PHS Commissioned Corps (All Agencies), by Professional Category, Fiscal Years 1980-1986

Professional Category	1980		1981		1982		1983		1984		1985		1986	
	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent
PHS Commissioned Corps: Total	7,204	100.0%	6,955	100.0%	5,840	100.0%	5,637	100.0%	5,410	100.0%	5,345	100.0%	5,468	100.0%
Physician	2,789	38.6	2,549	36.6	2,062	35.3	1,895	33.5	1,738	32.1	1,679	31.4	1,632	29.9
Dentist	950	13.2	974	14.0	827	14.2	811	14.4	685	12.7	617	11.5	609	11.1
Nurse	647	9.0	662	9.5	582	10.0	586	10.4	598	11.1	639	12.0	681	12.5
Engineer	585	8.1	582	8.4	543	9.3	534	9.5	552	10.2	559	10.5	563	10.3
Scientist	237	3.3	244	3.5	229	3.9	230	4.1	238	4.4	244	4.6	245	4.5
Sanitarian	294	4.1	293	4.2	273	4.7	275	4.9	282	5.2	279	5.2	281	5.1
Veterinarian	91	1.3	92	1.3	90	1.5	89	1.6	86	1.6	85	1.6	81	1.5
Pharmacist	595	8.3	582	8.4	452	7.7	455	8.1	475	8.8	502	9.4	513	9.4
Dietitian	88	1.2	88	1.3	74	1.3	70	1.2	65	1.2	65	1.2	65	1.2
Therapist	153	2.1	148	2.1	84	1.4	79	1.4	83	1.5	86	1.6	90	1.6
Health Services Officer	775	10.8%	741	10.7%	624	10.7%	613	10.9%	608	11.2%	590	11.0%	708	12.9%

SOURCE: U.S. DHHS, PHS, CPOD, Monthly Strength Reports (I-10), from Commissioned officer data system. All figures represent Commissioned Corps strength at the end of each fiscal year, except 1986, which reflects strength on June 30, 1986.

therapists have grown, as a proportion of the total Corps, since 1980 (table 14). Physicians declined sharply, from 38.6 percent of all officers to 29.9 percent. The declines among dentists and therapists were not as great. Nurses increased from 9 to 12.5 percent of all officers, and engineers also showed notable growth.

Trends in IHS and in IHS Areas

Table 3 (in chapter 2) showed total IHS staff, by pay plan, with percent Indian, for fiscal years 1980-1985. Total numbers of IHS full-time employees have remained relatively constant since 1980, at about 10,400, as have Commissioned Corps officers as a percent of total staff (increasing only slightly from 18 to 20 percent of the IHS workforce). Although there are far fewer Indians in the Commissioned Corps than in other IHS pay plans, Indians as a percent of all IHS Corps officers increased steadily from 3.2 percent in 1980 to 7.5 percent at the end of fiscal year 1985. Overall, Indians represented 59.5 percent of all IHS full-time employees at that time.

Table 15 presents data on Commissioned Corps officers in IHS, by IHS area, for fiscal years 1981 through June 30, 1986, a period in which the IHS Corps increased by 326 individuals (17 percent). All IHS areas experienced growth in Corps staff except Billings, which had a slight decrease (by 2.6 percent), and Tucson, which lost 6 officers, 25 percent of its 1980 staff, possibly due to reorganizations in the former Office of Research and Development at Tucson. Growth in Corps staff greater than the average 17 percent was reported in California (a 45 percent increase, but only 9 staff positions), Albuquerque (37.6 percent), Aberdeen (29.7 percent), Bemidji (28.4 percent), and Phoenix (19.4 percent). The area with the largest number of Corps officers, Navajo, increased by about 17 percent. Regular Corps as a percent of total Corps ranged from a low of 15.6 percent in Navajo to a high of 42.1 percent in Portland (1986).

Table 16 shows that from 1981 through 1985, the number of Corps physicians in IHS increased by 15 (2.7 percent). The June 30, 1986 figures probably are low, because new

Table 15.--PHS Commissioned Corps in IHS, by IHS Area, with Percent Regular Corps, Fiscal Years 1981-1986

IHS Area	1981 Total No.	1981 Percent Regular	1982 Total No.	1982 Percent Regular	1983 Total No.	1983 Percent Regular	1984 Total No.	1984 Percent Regular	1985 Total No.	1985 Percent Regular	1986 Total No.	1986 Percent Regular
PHS Commissioned Corps in IHS: Total	1,914	NA	1,884	NA	1,933	NA	2,064	NA	2,123	NA	2,240	NA
IHS Headquarters	92	NA	90	NA	70	NA	77	NA	100	NA	106	NA
Aberdeen	138	13.8%	132	28.0%	133	24.8%	147	21.1%	156	18.6%	179	16.8%
Alaska	252	22.2	242	26.9	252	27.4	265	28.7	262	27.5	271	26.6
Albuquerque	141	29.1	164	33.5	178	30.3	179	37.3	179	31.3	194	29.4
Bemidji	81	17.3	82	28.0	86	24.4	99	28.3	101	22.8	104	20.2
Billings	117	20.5	117	29.1	112	29.5	113	33.6	109	29.4	114	28.9
California	20	40.0	17	52.9	21	33.3	24	29.2	25	28.0	29	27.6
Nashville	44	36.4	48	47.9	53	43.4	48	45.8	43	51.2	47	40.4
Navajo	334	15.3	297	20.9	323	19.5	355	18.9	369	17.3	392	15.6
Oklahoma	263	29.7	270	41.1	268	40.3	294	39.8	294	36.4	302	35.4
Phoenix	304	29.9	293	35.5	301	33.6	327	33.3	348	31.9	363	29.5
Portland	104	34.6	105	40.0	111	38.7	111	45.9	118	42.4	121	42.1
Tucson	24	25.0%	27	25.9%	25	32.0%	25	32.0%	19	36.8%	18	38.9%

SOURCE: U.S. DHHS, PHS, CPOD, Monthly Strength Reports (I-10), from Commissioned officer data system. All figures represent Commissioned Corps strength at the end of each fiscal year, except 1986, which reflects strength on June 30, 1986.

Table 16.--PHS Commissioned Corps Physicians in IHS, by IHS Area, Fiscal Years 1981-1986

IHS Area	1981 No. MDs	1981 Percent Of Total	1982 No. MDs	1982 Percent Of Total	1983 No. MDs	1983 Percent Of Total	1984 No. MDs	1984 Percent Of Total	1985 No. MDs	1985 Percent Of Total	1986 No. MDs	1986 Percent Of Total
PHS Commissioned Corps in IHS: Total	555	100.0%	525	100.0%	531	100.0%	567	100.0%	570	100.0%	539	100.0%
IHS Headquarters	20	3.6	23	4.4	23	4.3	26	4.6	35	6.1	29	5.4
Aberdeen	25	4.5	24	4.6	23	4.3	27	4.8	30	5.3	29	5.4
Alaska	96	17.3	92	17.6	90	17.0	93	16.4	93	16.3	92	17.1
Albuquerque	41	7.4	43	8.2	48	9.0	53	9.3	53	9.3	53	9.8
Bemidji	17	3.1	15	2.9	16	3.0	16	2.8	15	2.6	15	2.8
Billings	34	6.1	33	6.3	34	6.4	37	6.5	34	6.0	29	5.4
California	1	-	1	-	1	-	1	-	1	-	1	-
Nashville	10	1.8	9	1.7	11	2.1	10	1.8	5	0.9	3	0.6
Navajo	107	19.4	93	17.8	90	17.0	97	17.2	100	17.6	93	17.3
Oklahoma	72	13.0	69	13.1	65	12.3	74	13.1	77	13.5	77	14.3
Phoenix	100	18.0	91	17.3	95	18.0	95	16.8	96	16.9	89	16.5
Portland	22	4.0	21	4.0	23	4.3	24	4.2	25	4.4	23	4.3
Tucson	10	1.8%	11	2.1%	12	2.3%	14	2.5%	6	1.1%	6	1.1%

SOURCE: U.S. DHHS, PHS, CPOD, Monthly Strength Reports (I-10), from Commissioned officer data system. All figures represent Commissioned Corps strength at the end of each fiscal year, except 1986, which reflects strength on June 30, 1986.

physicians beginning service during the summer may not all be included. The areas with the largest numbers of Corps physicians since 1981 have been Navajo, Alaska, Phoenix, and Oklahoma. On the other end of the scale, California has only 1 Commissioned Corps physician, Nashville has 3, Tucson 6, and Bemidji 15. Relative growth in the number of Corps physicians from 1981 through 1985 was greatest in IHS headquarters, which expanded from 20 to 35 physicians. This is largely due, however, to the practice of counting medical students and residents on placement to IHS from the Uniformed Services University of the Health Sciences with IHS headquarters Commissioned Corps medical staff until they are assigned to a field hospital or clinic to fulfill their service paybacks (there were 9 such medical officers included in headquarters staff late in 1986) (25). Albuquerque also showed a solid gain in Corps physicians (30 percent), Aberdeen expanded by 20 percent, but other areas either gained few Corps physicians or lost them.

Data from the CPOD system on the race and sex characteristics of PHS Commissioned Corps officers, and the limited data that could be gathered to address the Corps mobility issue, are presented later in this chapter.

ISSUES RELATING TO THE COMMISSIONED CORPS IN IHS

On most issues concerning the PHS Commissioned Corps, opinions tend to be sharply divided. Some DHHS officials believe the Corps offers real advantages over the civil service system because, as a part of PHS, it is more responsive to DHHS needs and policies than is the Federal Office of Personnel Management, which administers the civil service. Other managers in DHHS strongly dislike the Commissioned Corps, both because they perceive it as an elitist service intent on maintaining its special privileges, and because they believe Corps officers sometimes use their Corps status to evade the control of their agency directors.

The Commissioned Corps, as a career service of health professionals, has strong support in IHS. IHS owes much to the Commissioned Corps for its staff of physicians, dentists, pharmacists, engineers and sanitarians; and following closure of the PHS hospital system, the Corps increasingly looks to IHS to justify its continued existence. IHS officials are fond of pointing out that nearly 80 percent of IHS physicians are Commissioned Corps, along with 98 percent of the dentists and 86 percent of the pharmacists (but only 20 percent of the nurses) (112,25). The Corps, on the other hand, now recognizes that 41 percent of its officers are on active duty in IHS, which remains the only Federal direct health delivery system of any size in PHS. It is not surprising, then, that there is a close relationship between IHS and the PHS Commissioned Corps.

The Corps in IHS Recruiting and Retention

The role of the Commissioned Corps in recruiting and retaining health professionals, especially physicians, often is cited as one of its most important contributions to IHS. The Commissioned Corps is not itself a recruiting system; but as a personnel system, it offers an alternative to civil service employment that often is attractive to health professionals. Some individuals prefer enlistment in the Corps, which is viewed as an elite, quasi-military career service, to the low prestige of working in the Federal bureaucracy. Others, of course, may reject the Corps specifically because it is a uniformed service. Corps salary and benefits, including basic (taxable) pay and a variety of special pays and benefits, some of which are tax-free, usually are roughly comparable to civil service base pay and benefits (exclusive of overtime). The Commissioned Corps option of retirement after 20 years of service is frequently cited as an important positive factor in recruitment and, especially, retention of health professionals.

New recruits to IHS may choose between the Commissioned Corps and the civil service systems. Preferences for one or the other have varied over the years, changing with DHHS, Commissioned Corps, and IHS policy directions, and depending on the advantages and disadvantages specific to each professional category. During the past 10 years, a majority of new physicians and nurses have chosen civil service employment. Now that IHS is hiring primarily nurses with bachelor's degrees (the nursing degree required for Commissioned Corps eligibility), however, it is advantageous for new nurses to join the Commissioned Corps (20,55). The trend in physician hiring also seems to be toward the Commissioned Corps, because Corps physicians, who do not receive overtime pay, are less costly to IHS. For this reason, IHS has permission to encourage new physician hiring through the Commissioned Corps, rather than presenting a neutral choice between the Corps and the civil service (32).

Costs of the Commissioned Corps

It is the contention of OMB and others that PHS management is top-heavy with career Commissioned Corps officers performing administrative functions, although the mission of the Corps is to provide health professionals for clinical service in the field. Critics often point out that Commissioned Corps officers are exempt from the salary ceilings imposed on civil service employees, and in the higher ranks some 100 of them are paid more than the Secretary of DHHS (78). Because there is a large number of Corps officers in IHS, with many of them in high-level administrative positions in headquarters and area offices, the salary costs of these officers to IHS may exceed what IHS would pay civil service or Senior Executive Service employees in the same jobs. On the other hand, Commissioned Corps officers in IHS argue that there are more high grade Corps officers in other PHS agencies, particularly in NIH and CDC, than there are in IHS (20,32,18,112).

The relative costs of Commissioned Corps versus civil service staff may be substantially different in IHS field programs than in headquarters and the area offices. Those who support the Commissioned Corps argue that it offers IHS substantial administrative and cost advantages in staffing its hospitals and clinics. Corps officers are on duty 24 hours a day. In many IHS locations, which may be understaffed to begin with and so isolated geographically that it is difficult to use on-call staff, Corps physicians are a valuable resource because they do not incur the costs (and paperwork burden) of overtime pay for the 15 to 25 extra hours that many IHS physicians work each week.

As an example, the cost to an IHS hospital of hiring a new board-certified family practice physician, with a NHSC service obligation, as a Commissioned Corps officer, is compared here with the cost of that physician hired in the civil service. The physician's salary would be about $46,000 in the civil service, versus $31,000 in the Commissioned Corps (including base pay, quarters and subsistence allowances, variable special pay, and board certified pay). In the Corps, the physician would receive $9,000 in retention special pay, bringing his salary to about $40,000. Differences in the value of annual leave, sick leave, health and life insurance, retirement, continuing education benefits, moving expenses, and military benefits available to Corps officers are not included here. Both Commissioned Corps and civil service physicians have malpractice coverage under the Federal Tort Claims Act.

The most significant additional cost factor in this comparison is overtime pay, which is available only to civil service physicians. Overtime may be paid as earned up to the civil service maximum salary cap of about $69,000 per year. For civil service physicians in IHS, it is not at all uncommon to "max out" their overtime pay before the end of the year. Recently, a review of physician pay records for the Navajo area revealed that nearly every civil service physician in the area had been paid the maximum $69,000 annual salary; Commissioned Corps physicians had averaged $41-45,000. Not only does this create hostility between civil service and Commissioned Corps physicians working in the same facilities, but it destroys service unit and IHS area personnel budgets. In addition, if a civil service physician is no longer NHSC-obligated and is in civil service grade 14 or 15, he is eligible for a bonus of $7,000 to $10,000 beyond the $69,000 cap (the physician comparability allowance) for signing a 1 to 2 year continuation contract (25).

The rough cost comparison described above suggests that while Commissioned Corps officers may be more expensive than civil servants in some IHS headquarters and area office positions (especially when Corps physicians in administrative roles maintain their active clinical status, for bonus pay, by working the minimum one month per year in a clinical setting), the Corps may be a less costly means of staffing IHS field programs.

The complex pay, bonus, and fringe benefit structures of the two personnel systems may create misunderstandings and hostility between Corps officers and civil servants who are doing the same work. Assuming that IHS will continue to operate with staff in both personnel systems, however, greater efforts could be made to educate all IHS staff, and other interested parties, about the differences in the Commissioned Corps and civil service systems. The guiding principle behind modifications to either system should be to promote overall equity between them, without making them the same in all particulars, and to improve the ability of both the Commissioned Corps and the civil service to compete with the private sector in physician recruitment and retention.

Commissioned Corps Mobility

An administrative advantage in the Commissioned Corps that is much discussed but difficult to document is the ability to reassign Corps officers to fill vacancies in remote locations and to respond to health emergencies. Theoretically, Commissioned Corps officers, as members of a military uniformed service, are subject to reassignment with geographic transfer as needed at any time. Physicians in other uniformed services may be relocated routinely every 2 to 3 years; Corps officers serving in the Coast Guard, for example, move every 4 years. In the Epidemiological Investigations Branches of CDC, Commissioned Corps officers may be sent anywhere in the country on 24-hour notice to respond to emergencies such as outbreaks of Legionnaire's disease.

IHS has the authority to assign Commissioned Corps officers as needed to improve staffing in its hospitals and clinics. In practice, however, the potential mobility of Corps officers in IHS is not fully realized. Although some IHS positions (e.g., area directors) are now identified as rotational, IHS prefers not to use the Commissioned Corps as an involuntary mobile force of health professionals. Several IHS officials judge that mobility within IHS is about the same for Corps officers and civil servants, since transfers frequently are necessary for promotions (20,13,6).

Commissioned Corps officers in IHS, especially physicians, generally will not be moved against their wishes and those of the communities in which they serve (32). The argument for this approach is that IHS's mission is to provide the best possible health care to its eligible populations, and the forced relocation of medical staff does not contribute to quality care. On the contrary, staff familiar with the communities they serve should be able to provide superior care. This is little consolation to locations that lack adequate health care providers. In practical terms, however, forced rotation of clinical staff (Corps or civil service) is a no-win policy: the communities losing staff will be angry, the providers being moved will be angry (and may leave IHS rather than be relocated), and if forced to move against their wishes, they may not be motivated to provide the best care.

Data from the CPOD system on the issue of Corps mobility, both within IHS and between IHS and other PHS agencies, are not good enough to support objective analysis. Complaints that other PHS agencies attract away Corps members that IHS has hired (such transfers are relatively easy to make because the Corps personnel system serves several agencies) likewise can be neither documented nor dismissed on the basis of available data. The data necessary to compare transfers by civil service employees of PHS with those among Corps officers were not readily available, so the numbers of transfers that can be identified in the Commissioned Corps have little meaning.

Table 17 presents the limited data that were obtained on mobility in the Commissioned Corps. It summarizes numbers of personnel actions in the Corps, for fiscal years 1980 through 1986, in the following categories: new hires (calls to active duty); separations (inactivations, terminations, and retirements); geographic transfers; and other transfers. A geographic transfer is defined as a change in the zip code of the duty station or billet. One officer could change zip codes more than once, for a temporary assignment, and could relocate across town or across the country; thus, not all of these transfers involve family relocations. At the same time, an unknown number of geographic transfers probably are duplicated in "other transfers", a category that includes promotions, reassignments, and movements into or out of an agency, actions that often involve geographic transfers. There is

Table 17. PHS Commissioned Corps: Annual New Hires, Separations, Geographic Transfers, and Other Transfers, Fiscal Years 1980-1986

Type of Action	1980	1981	1982	1983	1984	1985	1986 (9 mos.)	1986 (adj. 12 mos.)
New hires (calls to active duty, including former Corps recalled to active duty)	1,958	1,332	750	882	934	750	396	528
Separations (inactivations, terminations, retirements)	1,699	1,668	1,874	1,080	1,150	825	288	384
Geographic Transfers[1]	844	NA	1,040	570	672	611	334	445
Other Transfers (transfers within the program, out of the agency)	418	2,315	1,754	1,234	1,150	983	696	928

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[1] Geographic transfers were reported as "duty station transfers" in 1980, were not reported separately from "other transfers" in 1981, and were reported separately from (but possibly duplicated by) "other transfers" for 1982-1986. A geographic transfer is defined as a change in the zip code of the duty station or billet; therefore, it is likely that some of these transfers do not involve officer and family relocations.

SOURCE: U.S. DHHS, PHS, CPOD, Monthly Strength Reports (I-10), from Commissioned officer data system. Figures represent total numbers of personnel actions, by type, during each fiscal year except 1986, which is reported both as actions during the first 9 months of the year and as adjusted 12-month figures. June and July are busy moving months, so even the 12-month adjusted figures may underrepresent actions for the full fiscal year.

no further information on the voluntary or involuntary nature of these moves (75).

All that can be said, based on the figures in table 17, is that a large number of geographic transfers took place between 1980 and 1982, when the PHS hospitals closed, and since 1983 transfers have been relatively constant. New hires to the Corps have dropped off since 1980-81, and separations were high especially in 1982. Table 18 presents personnel actions for the first 9 months of fiscal year 1986, by agency (note that the figures are low, because the fourth quarter of the fiscal year, July through September, is a very active period). It is not surprising that there was more activity in HRSA and IHS than in other PHS agencies, because IHS is the largest single employer of Corps health professionals, and HRSA includes both IHS and the community health center and migrant health programs that also use NHSC-obligated Corps staff.

Another feature of Commissioned Corps mobility that may be useful to IHS managers is the ability to reassign Corps officers on detail from one location to another, with no time limit placed on the detail. Some critics charge that IHS has overused this option, which allows transfers to be made without meeting the Indian preference requirements that would apply to a civil service employee (50,9). The extent of this practice and the seriousness of the charge could not be determined based on available data.

Inactive reserve members of the Commissioned Corps may be recalled to active duty in IHS (or other PHS agencies), voluntarily, for temporary placements to fill unexpected vacancies. This option could be especially valuable in IHS, where medical staff lost during the off-season of the recruiting year can be difficult to replace, and where there often is a need to identify and place medical staff quickly for temporary coverage. This option has not been used as extensively as might be desired, however, apparently due to administrative difficulties and problems with the registry of inactive reserve Commissioned Corps officers. At least a month must be allowed to process paperwork for such placements, and the ability to contact inactive officers who might be willing to take temporary assignments has been hampered by out-of-date addresses in the registry. Work was underway in fall 1986 to correct these

Table 18.--PHS Commissioned Corps, by Agency: Annual New Hires, Separations, Geographic Transfers, and other Transfers, Fiscal Year 1986 (9 mos. to June 30, 1986)

Agency	New Hires	Separations	Geographic Transfers	Other Transfers	Total Corps as of 9/30/85	Total Corps as of 6/30/86
PHS Commissioned Corps: Total	396	288	334	696	5,345	5,468
Health Resources and Services Administration	301	200	244	321	3,008	3,116
(Indian Health Service)	(251)	(123)	(193)	(212)	(2,123)	(2,240)
Food and Drug Administration	17	16	11	47	406	415
National Institutes of Health	29	22	10	94	727	730
Center for Disease Control	20	32	35	80	637	620
Alcohol, Drug Abuse, and Mental Health Administration	23	7	11	52	156	170
Environmental Protection Agency	0	5	6	30	244	242
Office of the Secretary	0	0	0	4	17	15
Office of the Assistant Secretary for Health	6	4	15	47	76	82
Health Care Financing Administration	0	2	2	20	74	77
Other/unknown	0	0	0	1	0	1

SOURCE: U.S. DHHS, PHS, CPOD, Monthly Strength Reports (I-10), from Commissioned officer data system. All agencies are in the Public Health Service except the Environmental Protection Agency, the Health Care Financing Administration, and the DHHS Office of the Secretary. See table 17 for definition of geographic transfers.

problems and make the inactive reserve Corps more readily available for temporary placements in IHS.

Minorities and Women in the Commissioned Corps

Some critics of the Commissioned Corps argue that it is an "old boys network", a privileged career service that discriminates in favor of members who are white and male. These critics contend that military-style physical fitness requirements for Corps eligibility are used to exclude women and minorities. Although it is not possible to confirm or refute discriminatory intent, data from the CPOD system show that in terms of race and sex, the PHS Commissioned Corps is in fact predominantly white and male. In the larger American workforce, however, white males continue to dominate most of the professions eligible for Corps membership (except nursing), and this may simply be reflected in the Corps.

Reporting of racial or ethnic identity is entirely voluntary in the CPOD data system. Therefore, the size of the "unknown/other" category (nearly 12 percent in 1986), which includes those who chose not to select a racial/ethnic identity, suggests that both whites and minorities are somewhat undercounted. Most individuals in the "unknown/other" category are thought to be white, in addition to the 77 percent of Corps officers in 1986 who reported themselves to be white (75). Table 19 shows that there has been more growth in Indian members of the Corps, both as a percent of the total Corps and in absolute numbers, than in other minority groups (Blacks, Hispanics, and Asian and Pacific Islanders). From 1980 to 1986, Indians in the Corps increased from 74 to 179 officers; and although Indians now represent only 3.3 percent of total Corps membership, that percentage exceeds the proportion of American Indians and Alaska Natives in the U.S. general population (less than 1 percent).

Table 20 compares numbers of Commissioned Corps officers in PHS, HRSA, and IHS, by profession and race (June 1986). Of the 179 Indian officers, 165 served in IHS and 55 of them were nurses. There were 17 Indian physicians in IHS, 10 dentists, 25 health services officers, and 57 officers in all other categories combined. In IHS alone, 7.3 percent of all

Table 19.--PHS Commissioned Corps (All Agencies), by Race (Minority Category), Fiscal Years 1980-1986

Race (Minority Category)	1980		1981		1982		1983		1984		1985		1986	
	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent
PHS Commissioned Corps: Total	7,204	100.0%	6,955	100.0%	5,840	100.0%	5,637	100.0%	5,410	100.0%	5,345	100.0%	5,468	100.0%
White (not Hispanic)	6,527	90.6	5,712	82.3	4,698	80.5	4,587	81.4	4,406	81.5	4,250	79.5	4,212	77.0
Black (not Hispanic)	297	4.1	336	4.8	276	4.7	266	4.7	219	4.0	197	3.7	198	3.6
American Indian/ Alaska Native	74	1.0	120	1.7	123	2.1	142	2.5	163	3.0	175	3.3	179	3.3
Asian & Pacific Islander	149	2.1	184	2.6	133	2.3	123	2.2	120	2.2	123	2.3	127	2.3
Hispanic	157	2.2%	170	2.4	152	2.6	154	2.7	133	2.5	120	2.2	114	2.1
Other/Unknown[1]	-	-	433	6.2%	458	7.8%	365	6.5%	369	6.8%	480	9.0%	638	11.7%

[1] The "other/unknown" race category reflects primarily individuals who choose not to report a minority racial or ethnic identity in the voluntary Commissioned Corps data system. Most of these are believed to be white (not Hispanic).

SOURCE: U.S. DHHS, PHS, CPOD, Monthly Strength Reports (I-10), from Commissioned officer data system. All figures represent Commissioned Corps strength at the end of each fiscal year, except 1986, which reflects strength on June 30, 1986.

Table 20.--PHS Commissioned Corps, by Agency and Race Category,
Total and for Selected Professions, June 30, 1986

Agency and Profession	All Races		White (not Hispanic)		Black (not Hispanic)		American Indian & Alaska Native		Asian & Pacific Islander		Hispanic		Other/ Unknown[1]	
	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent
Public Health Service: Total	5,468	100.0%	4,212	77.0%	198	3.6%	179	3.3%	127	2.3%	114	2.1%	638	11.7%
Physicians	1,632		1,208	74.1	64	3.9	21	1.3	56	3.4	43	2.6	240	14.7
Dentists	609		487	79.9	23	3.8	12	2.0	8	1.3	22	3.6	57	9.4
Nurses	681		456	66.9	46	6.8	57	8.4	11	1.6	11	1.6	100	14.7
Health Service Officers	708		473	66.8	26	3.7	27	3.8	17	2.4	12	1.7	153	21.6
Other	1,838		1,588	86.4	39	2.1	62	3.4	35	1.9	26	1.4	88	4.8
Health Resources and Services Administration: Total	2,978	100.0%	2,061	69.3%	99	3.3%	171	5.7%	71	2.4%	75	2.5%	501	16.8%
Physicians	772		468	60.5	39	5.1	19	2.5	31	4.0	29	3.8	186	24.1
Dentists	554		437	78.7	21	3.8	12	2.3	7	1.3	22	4.0	55	9.9
Nurses	524		335	63.9	24	4.6	55	10.5	9	1.7	10	1.9	91	17.4
Health Service Officers	295		136	46.0	9	3.1	27	9.2	9	3.1	3	1.0	111	37.6
Other	833		685	82.2	6	0.7	58	7.0	15	1.8	11	1.3	58	7.0
Indian Health Service: Total	2,240	100.0%	1,538	68.6%	37	1.7%	164	7.3%	45	2.0%	35	1.6%	421	18.8%
Physicians	539		332	61.6	16	3.0	17	3.2	20	3.7	11	2.0	143	26.5
Dentists	284		231	81.3	1	0.4	10	3.5	-	-	5	1.8	37	13.0
Nurses	450		279	62.1	16	3.6	55	12.2	7	1.5	7	1.5	86	19.1
Health Services Officers	216		84	38.9	-	-	25	11.6	4	1.9	2	0.9	101	46.7
Other	751		612	81.5	4	0.5	57	7.6	14	1.9	10	1.3	54	7.2

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[1] The "other/unknown" race category reflects primarily individuals who choose not to report a minority racial or ethnic identity in the voluntary Commissioned Corps data system. Most of these individuals are believed to be white (not Hispanic).

SOURCE: U.S. DHHS, PHS, CPOD; data tables generated by special request on Commissioned Corps data system, file of June 30, 1986. Total officers combine all regular active and active reserve Corps, including the 136 externs on duty in June 1986. As noted in table 11, the total number of Commissioned Corps officers in HRSA, 2,978, excludes the 138 officers funded by HRSA in the PHS Regional Offices who do not work on HRSA projects. Percents reflect officers by race category as a percent of total officers by profession (and all professions) within each agency (i.e., percents of row totals, not columns).

Corps officers were Indian, compared with 3.3 percent in PHS overall. Blacks, Hispanics, and Asians were represented in IHS in groups of 37 to 45 officers (about 2 percent each). Whites were the largest racial group among IHS Commissioned Corps officers (69 percent), and the second largest group was the "other/unknown" category, which included nearly 20 percent of the Corps in IHS. Because of Indian preference, IHS hires large numbers of Indians who, if they meet Corps eligibility requirements, may be employed by IHS as Commissioned Corps officers. Indians are not recruited for IHS by the Commissioned Corps; but it is not surprising that Indian officers in the Corps tend to serve in IHS, where the range of positions open to them and opportunities for promotion are better than in other PHS agencies.

As of June 1986, female Corps members represented 26 percent of all officers in IHS, 25.4 percent in HRSA, and 21.9 percent of officers throughout the PHS Commissioned Corps. As table 21 illustrates, the percent of women in the Commissioned Corps has not changed significantly since 1980, either in total officers or among Corps physicians.

Indian Preference in the Commissioned Corps

The fact that there are two different personnel systems in IHS, operating under different rules, complicates some aspects of personnel management. Another major complication, however, is the requirement that Indian preference be applied equitably to Commissioned Corps and civil service candidates for IHS vacancies (12). IHS and HRSA officials believe that Indian preference sometimes restricts career advancement and geographic mobility among non-Indian IHS staff (12,32).

Regulations governing Indian preference in IHS, based on the 1934 law, have been further defined by the courts and by 1980 amendments. Indian preference does not amend the Commissioned Corps or the civil service system; it is separate legislation that applies to personnel actions in IHS (and the Bureau of Indian Affairs) and, therefore, to both Commissioned Corps and civil service personnel actions in IHS. Indian preference is a personnel authority, and it is implemented through the personnel offices of IHS headquarters

Table 21.--PHS Commissioned Corps (All Agencies), by Sex, and PHS Commissioned Corps Physicians by Sex, Fiscal Years 1980-1986

Corps and Corps Physicians by Sex	1980		1981		1982		1983		1984		1985		1986	
	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent
PHS Commissioned Corps:														
Total	7,204	100.0%	6,955	100.0%	5,840	100.0%	5,637	100.0%	5,410	100.0%	5,345	100.0%	5,468	100.0%
Male	5,825	80.9	5,592	80.4	4,725	80.9	4,566	81.0	4,361	80.6	4,258	79.7	4,273	78.1
Female	1,379	19.1	1,363	19.6	1,114	19.1	1,071	19.0	1,049	19.4	1,087	20.3	1,195	21.9
PHS Commissioned Corps Physicians:														
Total	2,789	100.0%	2,549	100.0%	2,062	100.0%	1,895	100.0%	1,738	100.0%	1,679	100.0%	1,632	100.0%
Male	2,388	85.6	2,198	86.2	1,769	85.8	1,624	85.7	1,488	85.6	1,431	85.2	1,390	85.2
Female	401	14.4	351	13.8	293	14.2	271	14.3	250	14.4	248	14.8	242	14.8

SOURCE: U.S. DHHS, PHS, CPOD, Monthly Strength Reports (I-10), from Commissioned officer data system. All figures represent Commissioned Corps strength at the end of each fiscal year, except 1986, which reflects strength on June 30, 1986.

and the Federal Regional Personnel Offices (14). Indian preference overrides the choice between Commissioned Corps and civil service applicants for a position, such that Indians in either system take precedence over non-Indians. Equal Employment Opportunity procedures also apply after Indian preference (15).

Because there are differences between the two personnel systems, there have been charges that IHS could take advantage of those differences and manipulate the systems in a discriminatory manner. It has been said that job descriptions for IHS positions could be written differently in the Corps and the civil service, to favor candidates from one system or the other. Some critics have charged that IHS has used the Commissioned Corps to get around Indian preference, and the ability to detail Corps officers for unlimited periods of time has been cited as evidence to support that charge (50). IHS officials respond that although there may have been abuses in the past, this is no longer possible under current Indian preference policies and procedures. IHS does not set aside positions for Corps or civil service applicants; job requirements must be the same in the Corps and the civil service; and IHS must fill all vacancies under Indian preference, that is, by selecting the most qualified Indian candidate (where there is one), whether that candidate is Commissioned Corps or civil service (25,14,15).

The CPOD states that it makes no Indian preference determinations whatsoever: it merely reviews the qualifications of Corps members who apply for IHS positions and certifies those qualifications, leaving IHS to decide among Commissioned Corps and civil service applicants under its Indian preference policies. A Corps officer interested in an IHS position notifies his IHS area personnel office, which sends his name and qualifications to CPOD, Rockville. CPOD determines if the officer meets the requirements for the position. If he does, the officer may be included on the panel of candidates from which area office staff will make their selection. If someone with Indian preference applies from either the Commissioned Corps or the civil service, and meets the requirements for the position, that person is automatically on the panel. If a qualified Indian preference candidate is on the panel, qualified applicants without Indian preference are not included on the panel and cannot be considered, because if selected they could not be hired (15,25).

There are two types of civil service positions: those that must be filled under "competitive civil service" rules, and those under "excepted civil service" rules. HRSA intends to process personnel actions for Indians under excepted civil service rules, which allow waiver of the usual competitive hiring practices and the application of special qualification standards. HRSA already has authority to use excepted civil service hiring procedures, as do other Federal agencies including the Federal Bureau of Investigations and the Central Intelligence Agency. Thus HRSA would be able to implement Indian preference within existing personnel rules, by establishing two different sets of qualification standards for each position, competitive and excepted (12).

The Commissioned Corps in Tribal Health Programs

Tribally operated Indian health projects in the State of California have complained in recent years that they are at a disadvantage in recruiting and retaining medical staff, because they do not have access to IHS Commissioned Corps officers. In fact this is true, but it is due to the peculiar history of tribal contracting in California, rather than to specific regulations of the Corps. Commissioned Corps officers are available to tribal contractors that assume management of IHS services under two-party contracts (between the tribal organization and the Commissioned Corps, not the individual officer) called Memorandums of Agreement (MOAs). These agreements are similar to the Intergovernmental Personnel Act (IPA) transfer mechanism available to civil service employees assumed by tribal contractors.

The reason that tribal contractors in California would have difficulty obtaining Commissioned Corps officers under MOAs is a catch-22: IHS services have been delivered to California Indians since 1970 primarily through contracts with tribal organizations; there have never been more than a few IHS employees in the California programs, either Commissioned Corps or civil service; therefore, when California tribal contracts were converted to self-determination contracts after 1975 (and when tribes sought to provide new services under 638 contracts), there were few if any IHS employees or Commissioned Corps officers in California IHS programs who could be transferred to tribal employment. Under self-determination contracting, a tribe can only assume management of IHS programs and staff that already are in place. California tribal organizations could argue that they were contracting with IHS before the Self-Determination Act of 1975 made 638 rules the preferred method of contracting, and that some adjustment should be made to alleviate this disadvantage to California contractors. In fact, California tribes have appealed to IHS for special consideration, and they may be granted access to a limited number of Commissioned Corps officers on a trial basis.

As the discussions in this chapter indicate, there are strong feelings about the Commissioned Corps in IHS, and perhaps some misunderstandings. A case could be made either for or against the continued use of Commissioned Corps health professionals in IHS. But given the 30-year history of service by Commissioned Corps officers in IHS (and in fact PHS Commissioned officers served Indian populations before the 1955 Transfer Act, when Indian health still was a responsibility of the Department of Interior), it would take a strong case for excessive costs and abuses to justify eliminating the Commissioned Corps from IHS. Many IHS staff believe that there were years when IHS could not have operated without the Corps. And under the present circumstances, when the NHSC as a source of obligated physicians for IHS may soon be lost, the potential for transferring Commissioned Corps officers from other PHS assignments (for example at NIH, CDC, or the Coast Guard) to IHS if a staffing crisis arises should not be overlooked.

Further work to clarify the rules that affect use of Commissioned Corps and civil service medical staff in IHS, and education about these differences, might be worthwhile. Additional work also might be done on the relative costs of those two systems, in administrative and clinical settings. As noted earlier, if some of the more serious inequities between the two systems could be rationalized, without necessarily eliminating all differences, it could contribute to a more productive combined workforce.

CHAPTER 6:
INDIAN HEALTH MANPOWER TRAINING PROGRAMS

Health manpower training programs in the Indian Health Service (IHS) are authorized by Title I of the 1976 Indian Health Care Improvement Act, Public Law 94-437, as amended by Public Law 96-537 in 1980. The dual purpose of these programs is to recruit and train Indians in the health professions, and to increase the supply of health manpower and services provided to Indians. Thus, the programs have both employment and health delivery objectives.

Indian health manpower training scholarships first were awarded for the 1977-1978 academic year (fiscal year 1978). Funding in that year was about $6 million, and has continued at that level to the present. Through the end of fiscal year 1985, a total of $36 million had been awarded in support of 2,179 students (about 4,000 separate awards) in the preparatory and professional scholarship categories. The award per student averaged $16,000 (57).

For several years, the Department of Health and Human Services (DHHS) has opposed the award of new Indian health manpower scholarships, and in its annual budget requests has sought funding for continuation awards only. The Secretary of DHHS justified this action in a July 1985 statement that cited the projected oversupply of health professionals (especially physicians), the availability of other obligated individuals to serve in IHS (presumably National Health Service Corps (NHSC) scholars, although DHHS also proposed eliminating new NHSC scholarships), and the need for fiscal austerity (57). However, because appropriations in continuing resolutions covering the Indian health manpower training programs have not prohibited new scholarships, limited numbers of them have been awarded in fiscal years 1986 and 1987 in addition to continuation scholarships (60,47). A spokesman for the Health Resources and Services Administration (HRSA) stated that for fiscal year 1988, DHHS policy again will be to seek funding for continuation scholarships only. Without reauthorization of the Indian Health Care Improvement Act or enactment of another continuing resolution, the manpower training programs could be terminated altogether because, like the urban Indian health projects, they are not included under the broad Snyder Act authorization (68).

Controversy in the summer of 1985 about a scholarship awarded to the IHS Director's daughter further eroded support for the Indian health manpower training programs. As a result of that controversy, the responsibilities of the IHS scholarship branch were transferred to the NHSC until January 1987. The NHSC has been training IHS staff in its scholarship management process, while administering all IHS scholarship program activities. Unfortunately, NHSC management of the 1986-87 academic year awards was not entirely successful; only about 100 scholarships were awarded, fewer than usual, because of delays in processing applications. IHS expects to resume its administration of the scholarship programs in 1987 (34).

An IHS staff paper completed in May 1986 for the Office of the Assistant Secretary for Health, DHHS, documented the history of the Indian health manpower training programs and projected the costs of expanding those programs in 1988 to meet a larger share of future IHS manpower needs (57). Those recommendations were not accepted at the DHHS level. Within IHS, there is general agreement that the programs have succeeded in training Indian health professionals, and that a large proportion of those trained have worked for IHS; but the programs have been so small that they have not had a significant effect in reducing IHS manpower shortages.

IHS TRAINING PROGRAMS

The Indian Health Care Improvement Act and its 1980 amendments authorized six separate but related manpower training programs, described below (see summary table 22 for numbers of participants) (57,99). IHS headquarters (temporarily, the NHSC) administers the programs by providing central policy direction, placing and monitoring students, and issuing

Table 22.--Summary of IHS Formal Training Programs for Health Professionals, Paraprofessionals, and Tribal Leaders, Fiscal Years 1981-85

Type of Training Program	1981 Total Trained	1981 Percent Indian	1982 Total Trained	1982 Percent Indian	1983 Total Trained	1983 Percent Indian	1984 Total Trained	1984 Percent Indian	1985 Total Trained	1985 Percent Indian	Cumulative totals 1980-85 Total Trained	Cumulative totals 1980-85 Percent Indian
A. RESIDENCIES	27	3.7%	18	0.0%	19	10.5%	11	18.2%	20	10.0%	95	7.4%
1. Medical	15	0.0	11	0.0	9	0.0	-	-	6	0.0	41	0.0
2. Pharmacy	2	50.0	-	-	2	100.0	2	100.0	2	50.0	8	75.0
3. Dental	10	0.0	7	0.0	8	0.0	9	0.0	12	8.3	46	2.2
B. OTHER PROFESSIONAL	428	99.1%	820	48.3%	2,396	32.7%	3,547	39.6%	4,778	47.6%	11,969	44.2%
1. Student Training	379	100.0	350	95.7	145	89.0	162	88.3	145	73.8	1,181	92.5
2. Medical Clerkship	-	-	-	-	223	4.9	223	4.9	463	1.7	909	3.3
3. Nurse Training[1]	44	100.0	42	100.0	28	100.0	42	100.0	50	100.0	206	100.0
4. Clinical Support[2] (continuing education)	5	60.0	428	4.4	2,000	30.8	3,120	38.8	4,120	51.2	9,673	40.9
C. PARAMEDICAL	1,369	93.8%	562	100.0%	1,582	93.2%	2,667	94.4%	1,773	55.6%	7,953	85.9%
1. Health Records	182	100.0	-	-	-	-	-	-	-	-	182	100.0
2. Medical Lab. Techn.	17	70.6	20	100.0	-	-	-	-	-	-	37	86.5
3. CHR (Basic & Adv.)	500	100.0	99	100.0	86	100.0	168	97.6	216	100.0	1,069	99.6
4. Alaska Native CHA	98	100.0	67	100.0	106	100.0	1,400	100.0	90	100.0	1,761	100.0
5. Emergency medical	280	100.0	120	100.0	650	96.8	150	83.3	850	24.7	2,050	66.5
6. Comm. Health Medics	14	100.0	14	100.0	14	100.0	-	-	-	-	42	100.0
7. Dental Assts.	14	71.4	9	100.0	5	100.0	10	50.0	10	100.0	48	91.7
8. Environmental H.	128	40.6	-	-	152	42.8	195	40.5	184	20.1	659	35.4
9. Nutrition/Dietetics	120	100.0	233	100.0	569	100.0	744	100.0	423	100.0	2,089	100.0
10. Other (comm. health nurse social work)	16	100.0	-	-	-	-	-	-	-	-	16	100.0
D. OTHER	4,451	94.9%	169	76.3%	215	87.4%	221	85.5%	249	81.9%	5,305	96.6%
1. Tribal leader/employee[3]	3,779	100.0	-	-	-	-	-	-	-	-	3,779	100.0
2. Tribal mgt. support	625	100.0	138	89.9	201	93.0	201	93.0	207	95.2	1,372	96.2
3. Long-term training	47	23.4	31	16.1	14	7.1	20	10.0	42	16.7	154	16.9

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[1] For fiscal years 1981 and 1982, the nurse training category includes nurse anaesthetist and public health nurse/RN programs, in addition to the nurse education center for Indians and the advanced nurse training programs of 1983-85.

[2] Pharmacist primary care training was the only clinical support program listed for 1981. For 1982-85, clinical support programs include continuing education activities for physicians, pharmacists, and other professionals.

[3] For 1981 only, a separate program called "Upward Mobility" was included with other tribal leader/employee training activities.

SOURCE: Adapted by OTA from U.S. DHHS, PHS, HRSA, IHS, "Annual Report to Congress on the Indian Civil Service Retirement Act, Public Law 96-135", fiscal years 1981-85. This table summarizes activities of the formal training programs (including continuing education) funded by IHS for medical and dental professionals, paraprofessionals, and tribal leaders. It does not include short-term training programs funded by the IHS area offices.

grants. Direct contact with the students is maintained by part-time scholarship coordinators in the IHS area offices.

Health Professions Recruitment Program for Indians (Section 102)

This program provides grants to tribes, tribal organizations, urban Indian programs, and public or private nonprofit health and educational entities to identify and recruit Indians into the health professions, and to identify and publicize sources of financial aid. In fiscal year 1984, section 102 funding went to the Indians into Medicine (INMED) program at the University of North Dakota, four Master of Public Health programs, and to individual students for the costs of participating in those programs (tuition and fees, transportation, and salaries if serving an extern assignment).

Health Professions Preparatory Scholarship Program for Indians (Section 103)

Awards in this category (see table 23) are intended to prepare Indian students for enrollment in health professional schools and to provide compensatory education (additional or repeat courses), if necessary, to maintain enrollment. Students may receive section 103 awards for two years; there is no service payback obligation.

Pregraduate Education Program (Section 103P)

The pregraduate education program was authorized by the Indian Health Care Amendments of 1980 (Public Law 96-537, section 3(b)(1)(2)). Scholarships may be provided for up to 4 academic years of pregraduate education, although at present awards are limited to 2 years. These awards support Indian students working toward baccalaureate degrees in preparation for medical, dental, osteopathic, veterinary, optometry, or podiatry programs. For the 1986-87 academic year, junior and senior premedicine and predentistry students received priority for these scholarships. There is no service payback obligation associated with section 103P awards.

Table 23.--IHS Health Professions Preparatory Scholarship Program for Indians (Public Law 94-437, sections 103 and 103P), Total and New Scholarships Awarded, Fiscal Years 1980-1985

Health Profession	Annual Scholarship Awards 1980 new	1980 total	1981 new	1981 total	1982 new	1982 total	1983 new	1983 total	1984[1] new	1984[1] total	1985[1] new	1985[1] total	Cumulative Totals [2] 1980-85
Accounting	-	-	-	-	-	-	-	-	1	1	0	2	1
Biostatistics	-	-	-	-	-	-	-	-	-	-	-	-	-
Dentistry	2	5	0	4	4	4	0	3	-	-	-	-	6
Engineering	16	19	2	16	0	1	-	-	-	-	-	-	18
Health Care Admin.	3	3	0	2	-	-	-	-	-	-	-	-	3
Health Education	2	3	0	3	0	1	-	-	-	-	-	-	2
Medical Records	8	9	1	9	0	2	-	-	-	-	-	-	9
Medical Technology	17	21	2	13	14	18	14	24	0	11	0	1	47
Medicine	4	4	1	2	81	99	13	68	0	3	-	-	99
Mental Health	0	3	0	1	0	1	-	-	-	-	-	-	-
Nursing	42	58	25	67	46	61	57	81	124	157	67	133	361
Optometry	1	1	0	2	4	4	3	6	1	6	-	-	9
Pharmacy	12	14	0	6	-	-	-	-	-	-	-	-	12
Physician Asst.	2	2	0	1	-	-	-	-	1	1	-	-	3
Predentistry	-	-	-	-	-	-	-	-	4	6	0	3	4
Premedicine	-	-	0	11	-	-	-	-	59	104	25	90	84
Speech Pathology	0	1	1	1	5	6	0	4	-	-	-	-	6
X-ray Technology	5	9	0	4	4	4	10	12	0	4	-	-	19
All Other	13	22	0	13	0	2	-	-	-	-	0	1	13
Totals	127	174	32	155	158	203	97	198	190	293	92	230	696

[1] Fiscal year 1984 and fiscal year 1985 figures combine scholarships under Public Law 94-437 sections 103 and 103P.

[2] Cumulative total awards, 1980-85, represent total awards in 1980 plus total new awards made in fiscal years 1981-85.

SOURCE: Adapted by OTA from U.S. DHHS, PHS, HRSA, IHS, "Annual Report to Congress on the Indian Civil Service Retirement Act, Public Law 96-135", fiscal years 1980-85.

Health Professions Scholarship Program of IHS
(Public Health Service Act Section 338-G)

The health professions scholarship program (section 338-G of the Public Health Service Act, as established by section 104 of Public Law 94-437) technically is part of and administered by the NHSC program. These scholarships (see table 24) provide tuition, fees, books, a living stipend, and other necessary financial aid to qualified students in selected health professions who agree, upon graduation, to serve Indian people in an IHS or tribally operated facility, an urban Indian health project, or in private practice in a health manpower shortage area with a significant Indian clientele. These awards are open to non-Indians, although Indian students take precedence. Like NHSC awards, the scholarships may be paid back by obligated service or by reimbursing three times the amount received plus interest.

By the end of fiscal year 1984, a total of 505 individuals had graduated from professional schools using IHS health professions scholarships. Of these, 341 were working in IHS, 136 had completed their paybacks, 8 were in the placement process, and about 20 were pursuing postgraduate education (these figures from the May 1986 staff paper do not agree exactly with those in table 24, which are from a different source). The program claims an average retention rate of 83 percent, due in part to ongoing contact between area office staff and the students (57).

IHS Extern Program (Section 105)

The extern program provides employment during nonacademic periods, up to 120 days per year, for recipients of IHS health professions scholarships and others enrolled in health professional schools (table 25). Student externs work under direct professional supervision in IHS and tribal health facilities, or in urban Indian health projects. Because externs have not completed their professional degree programs, the types of health services

Table 24.--IHS Health Scholarship Program (PHS Act section 338g),
Total and New Scholarships Awarded, Fiscal Years 1980-1985

Health Profession	Annual Scholarship Awards												Cumulative Totals[1] 1980-85
	1980		1981		1982		1983		1984		1985		
	new	total	new	total	new	total	new	total	new	total	new	total	
Accounting	-	-	-	-	-	-	-	-	9	9	0	4	9
Biostatistics	-	-	-	-	1	1	0	1	0	1	-	-	1
Dentistry	1	4	0	3	3	7	0	4	1	6	7	11	12
Engineering	5	19	4	16	0	13	0	6	0	6	18	22	27
Health Care Admin.	20	52	1	27	5	18	9	22	8	23	0	10	43
Health Education	4	18	0	14	6	13	0	11	0	2	-	-	10
Medical Records	7	19	6	13	0	10	0	4	0	2	18	19	31
Medical Technology	18	42	7	30	6	26	2	17	15	32	0	24	48
Medicine	1	5	1	15	10	32	7	48	13	59	10	67	42
Mental Health	2	22	0	19	1	17	0	6	0	2	-	-	3
Nursing	31	106	67	121	63	137	70	140	66	162	80	205	377
Optometry	1	1	2	4	2	6	2	5	3	6	2	9	12
Pharmacy	2	14	0	12	1	10	0	4	1	4	6	7	10
Physician Asst.	4	7	0	5	4	6	0	2	1	1	-	-	9
Predentistry	-	-	-	-	-	-	-	-	-	-	-	-	0
Premedicine	-	-	0	7	-	-	-	-	0	1	-	-	0
Speech Pathology	2	3	5	8	2	6	0	6	0	7	0	2	9
X-ray Technology	11	19	4	14	5	17	18	26	17	33	0	9	55
All Other	19	59	0	27	0	15	0	6	-	-	-	-	19
Totals	128	390	97	335	109	334	108	308	134	356	141	389	717

[1] Cumulative total awards, 1980-85, represent total awards in 1980 plus total new awards made in fiscal years 1981-85.

SOURCE: Adapted by OTA from U.S. DHHS, PHS, HRSA, IHS, "Annual Report to Congress on the Indian Civil Service Retirement Act, Public Law 96-135", fiscal years 1980-85.

Table 25.--Individuals Employed through IHS Extern Program (Public Law 94-437, section 105), by Health Professional Category, Fiscal Years 1980-1985

Health Profession	1980	1981	1982	1983	1984	1985	Totals 1980-85
Alcoholism	5	2	0	0	1	0	8
Audiology/Speech	0	4	0	1	1	0	6
Dentistry	4	6	1	2	3	12	28
Dietetics/Nutrition	5	6	6	1	0	3	21
Engineering/Sanitation (Environmental Health)	7	11	4	4	0	18	44
Health Education	2	1	3	6	1	0	13
Hospital Admin.	3	7	7	5	4	0	26
Medical Records	4	16	4	2	0	0	26
Medical Technology	0	0	0	10	3	0	13
Medicine	0	0	0	4	12	0	16
Mental Health	6	2	4	1	0	0	13
Nursing	82	24	25	23	35	46	235
Optometry	85	0	0	0	0	0	85
Pharmacy	8	8	3	1	0	0	20
Physician Assistants	0	3	0	0	0	0	3
Social Service	10	2	1	1	0	0	14
X-ray Technology	0	0	0	1	2	0	3
Totals	221	92	58	62	62	79	574

SOURCE: Adapted by OTA from U.S DHHS, PHS, HRSA, IHS, "Annual Report to Congress on the Indian Civil Service Retirement Act, Public Law 96-135", fiscal years 1980-1985.

they can provide are limited. Externs are paid at civil service rates appropriate to their educational levels. This program is seen by IHS staff as a productive recruiting tool, because it introduces students to Indian communities and the actual conditions of health care delivery in IHS.

Continuing Education (Section 106)

Since 1980, funds for section 106 continuing education activities (approximately $100,000 per year) have come from the IHS clinical services budget. Continuing education opportunities for IHS employees are intended to attract and, especially, to retain quality health professionals. Funds cover travel costs, per diem, and tuition for up to 480 hours of professional consultation and refresher courses per person per year, including courses necessary to maintain and update professional licenses.

ROLE OF THE TRAINING PROGRAMS IN IHS

Indian health manpower training awards are directed each year to the types of staff in greatest shortage in IHS, based on Resource Requirement Methodology criteria and information on vacancies, attrition, and turnover. Although physician training has taken priority since 1982, the programs originally focused on nurses and allied health professionals. This focus was an IHS policy decision, because before 1980 the NHSC provided ample scholarships for physicians (41). The increased supply of medical records technicians has been one of the programs' successes. The training of some of the other allied health professionals, such as medical technologists and lab technicians, has been less successful due to limited placement opportunities for graduates (59).

The Indian health manpower training programs have had relatively high dropout rates, up to 40 percent (10); but among the students who have graduated, placements in IHS and tribally operated facilities and in urban Indian health projects have been high. Only the IHS health professions awards (Public Health Service Act section 338-G) bear a payback obligation. In placing graduates of these scholarship programs, first priority goes to IHS programs, then to tribal and urban projects, and finally to private pay options serving Indian populations. Most graduates have been placed in IHS (59).

A problem has been identified with eligibility for these programs: apparently some Indians who were eligible for and graduated from the training programs subsequently could not be hired in IHS because they did not meet IHS Indian preference requirements. Such IHS-funded graduates pay back their service obligations, if they have them, in a private practice setting. The May 1986 IHS staff paper on manpower training proposed that program eligibility criteria be revised to conform with Indian preference requirements for employment in IHS.

Nurses are the largest single professional category of IHS staff, representing about 2,800 individuals out of the total 10,000 to 11,000. Given an annual turnover rate of 20 to 24 percent, IHS estimates that about 650 new nurses must be recruited each year. The NHSC provided IHS with 45 to 50 nurses annually until 1981, when NHSC ceased to offer nursing scholarships. Although most nurses continue to be recruited directly from the private sector, the Indian health manpower training programs have been a significant source of IHS nurses. Since 1982, the programs have graduated and placed in IHS an average of 45 nurses per year; 270 of the programs' 466 total placements from 1978 through 1985 were nurses (57). The IHS nursing services branch estimates that another 200 to 300 nurses may be available to IHS from these manpower training programs through 1990. Indian students take somewhat longer to complete nursing degrees than do non-Indians, due to the generally lower quality of high school education for Indians. Indian nursing students in the manpower training programs also tend to be older than average, and thus longer out of high school. As a result, it is not uncommon for Indian student nurses to take extra or remedial courses (64).

The Indian health manpower training programs have not been an important source of physicians for IHS. As noted, this is the result of a policy in effect until 1982. In 1986, there were 82 students in medical schools who were receiving Indian Health Care Improvement

Act scholarships. One physician will be available for placement in 1988, and the director of IHS physician recruiting estimates that the programs continued at their current size could produce 15 physicians per year (58,20). The estimated future need for IHS physicians, however, is at least 200 per year, so these training programs will not greatly affect that gap. Like Indian nurses, Indian physicians may take longer to complete their training than non-Indians. Many Indian medical students (20-25 percent) require 5 years to finish medical school because of weak preparatory courses, especially in anatomy and physiology. The manpower training programs have funded some Indian premedical students in their junior and senior years of college, but not all such students have been accepted by medical schools (20).

Title IV of the Indian Education Act, administered by the Department of Education (DOE), provides scholarships to eligible Indians in a variety of academic fields. Indian students preparing for health careers are eligible for these scholarships, which sometimes have been more generous than IHS awards and have carried no payback obligation; but the numbers of students and total dollar amounts have not been large. In the 1984-85 academic year, the last year for which data are available, 38 Indians in health-related fields received academic support totalling $444,100 (84). In spite of fears that Title IV awards in health disciplines might be phased out because they duplicate the IHS health manpower training programs, DOE has continued to make health fellowship awards for the 1985-86 and 1986-87 academic years (17).

Other programs not supported directly by IHS, such as nurse training programs in community colleges, have trained Indians in the health professions. These programs have operated on or near many of the large reservations, but several of them recently lost accreditation and closed, including the programs at Pine Ridge and Navajo. The loss of accreditation was due to the inability of these small, isolated programs to offer adequate clinical experiences for their students. Typically, students training at the local community college would have only one or two instructors, and the only clinical experience available was in the IHS hospital where they hoped to be employed. Although IHS has hired nurses from these programs, they have not always been fully qualified. Most of the community college programs confer nurse associate degrees only, while IHS prefers to hire baccalaureate nurses for its professional nursing positions. On the other hand, the community college programs do play a role in training Indian nurses who would not seek training if they had to go away to school (64).

Based on the numbers of health professionals graduated from the Indian health manpower training programs, relative to IHS's annual staffing needs, it appears that the IHS programs have been more successful in their training and employment objectives than in increasing capacity for IHS services delivery. IHS still must rely on outside sources to fill most of its vacancies. On the other hand, the uncertain future of the NHSC, which has been IHS's primary source of new physicians, and the expectation of at least a temporary disruption in the supply of NHSC obligated physicians, could argue for interim continuation of the Indian health manpower training programs, including new scholarship awards. The medical extern program, for example, which allows medical students to work in IHS programs during their summer breaks, has provided exposure to the IHS system that frequently is cited as a positive factor in physician recruitment.

OPTIONS FOR IHS HEALTH MANPOWER TRAINING PROGRAMS

Congress and IHS could consider any of the following options for the future role of the Indian health manpower training programs authorized by Title I of Public Law 94-437: 1) New scholarships could be discontinued entirely, those in the pipeline completed, and the programs allowed to phase out. In this case, DHHS and IHS would abandon the objective of recruiting and training Indians for health professions in IHS. 2) IHS could consolidate the programs, that is, continue to support the one or two that have been most successful. For example, IHS might focus its resources on nurse training. 3) IHS could continue all training programs at limited levels, as a survival strategy, while the impact of the loss of NHSC scholars is assessed. 4) The programs could be expanded as proposed in the manpower planning paper to meet a larger share of IHS manpower needs; but until now this option has been rejected by DHHS. To pursue this last option, Congress would need to reauthorize the Indian Health Care Improvement Act with specific directives and funding for new scholarship awards.

The costs of expanding the Indian health manpower training programs would have to be considered, relative to the costs of loan repayment for selected professionals or direct hiring. The IHS programs provide support to Indian students at a very early stage, in premedicine and predentistry; and IHS provides more remedial support than other scholarship programs. The result is that Indian students may require 1 to 2 more years of support than non-Indian students, and the programs may become relatively expensive. On other hand, it may be argued that costs per graduate hired by IHS may be lower than some other recruiting approaches, and thus may justify the more costly support. The stated purpose of the IHS health manpower training programs, after all, is to provide Indians with opportunities for education, employment, and economic improvement, in addition to developing a larger pool of health professionals for IHS.

CHAPTER 7:

STAFFING IN TRIBAL HEALTH PROGRAMS

Since enactment of the Indian Self-Determination and Education Assistance Act (Public Law 93-638) in January 1975, tribal self-determination has been a central theme of Federal Indian policy. The intent of the law, in the view of Indian organizations, was to encourage tribal governments to assume greater management control over services provided to them by the Bureau of Indian Affairs (BIA, in the Department of the Interior) and the Indian Health Service (IHS). IHS's official policy toward self-determination has been one of neutrality, neither encouraging nor discouraging tribes that are interested in taking over management of their health programs.

In the 10 years since self-determination or "638" contracting became an option, tribes in some IHS areas have responded enthusiastically to the opportunity to manage entire service units. Several IHS hospitals and clinics have been transferred to tribal control under 638 contracts. The most recent major transfer involved the Mt. Edgecumbe hospital and service unit in Southeast Alaska, completed in January 1986. The Choctaw hospital at Talihina, Oklahoma, was transferred to tribal control in January 1985, and the Mississippi Choctaw hospital at Philadelphia, Mississippi, came under tribal management in January 1984. In 1985, tribes operated 5 of 51 IHS hospitals (6 hospitals were tribally operated in 1986, following the Mt. Edgecumbe transfer) and 53 of 124 clinics. Of 125 service units in IHS, 47 were tribally operated under 638 contracts in October 1985 (100). Many tribes manage specific service programs under relatively small 638 contracts: for example, community health representatives, alcohol services, and health education programs frequently are administered by the tribes.

Since the Mt. Edgecumbe contract, however, no large new self-determination proposals have been developed. Tribal governments are uncertain about the advantages of 638 contracting, because of uncertainty about the adequacy of contract funding. Although most of the IHS budget is protected from mandatory Gramm-Rudman deficit reduction cuts, when health care cost inflation is taken into account, substantial real budget growth cannot be expected in the immediate future. Tribes contemplating self-determination contracts have to consider this prospect carefully, because if their operating costs exceed the contract award, chances of assistance from IHS would be slim.

In fiscal year 1985, tribes administered about $141 million (30 percent) of the total IHS hospitals and clinics budget of $637 million, primarily under 638 contracts. Some of the early 638 contracts provided for indirect and administrative costs. Funding in recent years has been more limited, however, to the extent that some tribal governments claim they cannot deliver the same level of services that formerly was provided by IHS. In 1986, IHS was working on a formula that explicitly recognized the need for indirect cost assistance to contractors. Legislation was considered in the 99th Congress (1986) to guarantee 638 contract support costs (H.R. 4174, which passed the House but failed in the Senate) and to address the critical problem of malpractice liability insurance for employees of tribal health programs by extending Federal Tort Claims Act coverage to such employees. Both measures failed, however, leaving these pressing problems in self-determination contracting unresolved.

Another factor in the uncertainty about 638 funding is the proposed application of IHS's new resource allocation methodology to determine funding for tribal contract programs on the same basis as funding for other IHS service units. The new methodology would take into account as available resources most of the reimbursements collected by tribal contractors from non-IHS sources (e.g., Medicare, Medicaid, and other third-party reimbursements). Successful tribal contractors have worked hard to identify and collect other sources of support, and factoring these collections into the resource allocation formula is seen as a disincentive to outside collections and an attempt by IHS to limit its contributions to tribal program budgets.

ALTERNATIVES FOR STAFFING TRIBAL HEALTH PROGRAMS

Program staffing constitutes a major component of self-determination contract costs.

In addition to the costs of salaries, benefits, and liability insurance, tribal contractors also assume personnel management and recruiting responsibilities when they take over operation of a health delivery program. Public Law 93-638 amended a number of other laws to provide means for tribes and tribal organizations to staff self-determination contracts. The original Self-Determination Act in January 1975 amended the Intergovernmental Personnel Act (IPA) of 1970, by including Indian tribes and tribal organizations along with States, local governments, institutions of higher education, and nonprofit educational organizations as eligible recipients of Federal civil service employees under the IPA mechanism. Public Law 93-638 (section 105 (e)) also allowed Federal employees to resign, enter tribal employment with no break in service, and potentially retain Federal life and health insurance, civil service retirement benefits, and Federal workers' compensation, if the tribal contractor agrees. The Self-Determination Act did not specifically provide for tribal employment of Commissioned Corps officers, but the Public Health Service Act (P.L. 78-410, section 214, subsection (d)) permits the Department of Health and Human Services (DHHS) to assign Public Health Service (PHS) Commissioned Corps to tribal governments using Memorandums of Agreement (MOAs). Finally, the Military Selective Service Act was amended to allow service credit for periods of tribal employment.

In addition to these provisions of Public Law 93-638, the Department of the Interior Appropriations Act for fiscal year 1984 (Public Law 98-146, signed November 4, 1983) contained an amendment to section 3372(a) of title 5, U.S. Code, creating special purpose IPAs for civil service employee assignments to Indian tribes and tribal organizations. These special purpose IPAs, which are an option only at the time of an initial 638 takeover, are not time-limited as are regular IPAs. Regular IPAs allow a Federal civil service employee to be assigned out of the Government for one 2-year term, with the option of one 2-year extension. These time limitations would severely handicap Indian self-determination contract staffing, because the purpose of the contract is ongoing, not temporary, tribal management of the health program.

The Self-Determination Act thus encouraged tribal contractors to build their core program staff around IHS employees already at the site. There are important advantages to both the tribes and IHS in doing so. It is much less costly and disruptive for IHS if the contractor uses all or most of the incumbent IHS staff, because if the tribe does not use them, IHS is obligated to reassign those employees or terminate them under RIF (Reduction-in-Force) procedures. Assumption of IHS staff by the tribal contractor guarantees adequate start-up staff and ensures a smooth transition in service delivery. The contractor may select the individuals it wishes to keep, and may use any or a combination of options to hire them: direct hiring of former Federal employees, civil service assignments under IPA rules, or MOAs for Commissioned Corps officers. In addition to these options, the tribe may choose to hire non-Federal employees.

There are substantial financial advantages to tribal contractors in using Federal staff under IPA and MOA assignments, because such individuals remain employees of IHS and their salaries and benefits are paid from the IHS budget. The amount of their compensation generally is listed as "in kind" contributions and is "backed out", or subtracted from, the 638 contract award. This continuation of Federal salary and benefits, especially retirement benefits, probably encourages IHS staff to stay with the tribally operated program. More importantly, because these individuals remain IHS employees, they are covered by the Federal Tort Claims Act and the contractor is saved the expense of buying private malpractice insurance.

A disadvantage of retaining Federal staff is that the jobs cannot be made available to tribal members; but some of the Federal employees already may be tribal members who do not want to lose their Federal benefits. Because contractors may retain Federal staff selectively and fill such positions as they choose with new hires and tribal members, the tribes should be able to set up staffing patterns that meet their priorities. For example, tribal contractors may use IPA and MOA transfer agreements to keep Federal employees in some positions, such as the hard-to-recruit clinical and support slots, while hiring tribal members in other or additional positions. (IHS area office staff believe that in some cases, 638 contractors have tended to overstaff their projects with tribal members in order to provide needed jobs.) The 638 contract negotiation process does not require a tribe to staff its program exactly as it was staffed under IHS, but it does require the tribe's personnel management plan to be approved by IHS area office staff as adequate and appropriate to deliver the service package specified in the contract.

Indian preference as it applies to employees of tribal self-determination contracts is somewhat more flexible than the absolute Indian preference that governs personnel actions in IHS and BIA. In 638 contracts, Indian preference is guided by contracting regulations (42 CFR 36.221) and applies only to new staff hired to carry out the contract. Tribal contractors may hire non-Indians after giving full consideration to Indian applicants, but there may be additional considerations of tribal preference in hiring and training.

Technical assistance to tribes in developing self-determination contract proposals, contract negotiations, and subsequent monitoring of contract performance are responsibilities of IHS area office staff. In addition, area office staff must counsel all employees of the prospective 638 program about their employment options, whether the tribe wishes to hire them or not. The IHS Office of Tribal Activities has developed detailed guidelines for self-determination contract personnel management. Such guidelines are necessary because of the several personnel options available to tribal contractors and the variations that may result when a program is administered through 12 area offices. Indian preference, in particular, has been implemented somewhat differently among the areas. The purpose of personnel guidelines was to encourage greater consistency in all aspects of 638 program personnel management, including Indian preference. The first set of guidelines was distributed in 1981; a revised document, published in June 1986, is the source of the personnel option descriptions that follow (102).

Direct Hiring of Former Federal Employees

Table 26 shows that as of March 31, 1986, tribal contractors employed 185 Federal civil servants under IPAs, 146 Commissioned Corps using MOAs, and 75 former Federal employees hired directly. Of this last group of 75 former Federal "direct hires" (to distinguish them from individuals hired by the tribes from other sources), very few retained any of their Federal benefits: 4 retained retirement benefits; 3 had health insurance; none kept life insurance; and 72 retained reemployment rights only. Nineteen individuals carried over no Federal benefits except reemployment rights ("Indian preference does not apply to an individual with reemployment rights," 5 CFR 352.703).

Although detailed rules were developed to permit retention of benefits by former Federal direct hires (Public Laws 93-638 and 99-221), few have taken advantage of them. Benefits may be continued only with tribal written consent, because the tribes must make the employer contributions to those benefit programs. Federal benefits may be more costly than tribal employee benefits, so it is not in the tribe's interest to consent; in some cases, tribal benefits may be better than the Federal plans. Direct hire employees usually switch to tribal benefit plans, because in order to retain Federal retirement the individual would have to make the employee retirement fund contributions, in addition to paying Social Security (14).

When a tribal organization takes over an IHS function under a 638 contract, "the function ceases to exist in IHS at that location. Therefore, the Civil Service positions are effectively abolished through implementation of the contract" (102). The tribal contractor is not obligated to use Federal employees in its program, and failure to offer them employment cannot be appealed under Federal statute. These Federal employees must be placed in other IHS or PHS vacancies, or RIFed. A RIF requires Health Resources and Services Administration (HRSA) approval of IHS authority to conduct a RIF, and it must follow very specific procedures including careful attention to Indian preference. Commissioned Corps officers are not subject to RIF, but if not assigned to the tribal contractor they will be reassigned elsewhere in IHS or PHS.

Table 26.--IHS Federal and Former Federal Employees Working for Tribal Contractors, by IHS Area, March 31, 1986

IHS Area	Former Federal Direct Hire Employees	IPA Assignments	Commissioned Corps Assignments (MOAs)	Total Federal and Former Federal Employees Working for Tribal Contractors
Aberdeen	0	5	2	7
Alaska	21	151	70	242
Albuquerque	0	0	2	2
Bemidji	0	1	24	25
Billings	0	4	1	5
California	0	0	0	0
Nashville	3	8	3	14
Navajo	0	4	2	6
Oklahoma	51	5	30	86
Phoenix	0	4	6	10
Portland	0	3	4	7
Tucson	0	0	0	0
IHS Headquarters	0	0	2	2
IHS Total	75	185	146	406

SOURCE: Adapted by OTA from U.S. DHHS, PHS, HRSA, IHS, quarterly tables "Summary of Employment of IHS Employees by Indian Tribal Organizations under Public Law 93-638, (direct hire)" and "Summary of Intergovernmental Personnel Act (IPA) Assignments and Commissioned Officer Assignments", as of March 31, 1986.

Intergovernmental Personnel Act (IPA) Assignments

The transfer of Federal civil servants (not PHS Commissioned Corps) to tribal employment under the special purpose IPA agreements that are available at the time of an initial takeover is a popular option for tribal contractors. As of March 31, 1986, a total of 185 Federal employees worked for tribal contractors under IPAs; all but 3 were on special purpose IPAs. Of these, 151 were in the Alaska area, where the Mt. Edgecumbe hospital and service unit transfer was accomplished primarily by the use of IPAs (and MOAs for the Commissioned Corps officers). In other IHS areas, there were no more than 5 to 8 IPA transfers each (table 26).

Tribal contractors may use regular IPAs to hire Federal civil service employees at any time after the initial 638 takeover, or to hire Federal employees who were at another IHS location at the time of the takeover. Special purpose IPAs, available only at the time of the initial 638 takeover, are defined in personnel guidelines as "an assignment which continues an incumbent in an IHS function at the time of initial P.L. 93-638 take over contract to perform the same duties at the same location with an Indian tribe or tribal organization" (102). Individuals on special purpose IPAs are not obligated to return to Federal service and are not eligible for promotion while on IPA assignment. The guidelines continue (102):

> Since the Federal employees assigned under an IPA detail are not employees of the contractor and are not paid by the contractor, there is no direct or indirect cost incurred by the contractor with respect to their Federal salary and fringe benefit payments. Therefore, the amount of funds provided for the support of the IPA detail positions (and for other related employee benefits) is not included in the estimated cost of the contract and remains in the IHS budget. Such resources are usually cited in the contract as "in kind" services provided through an IPA detail position.

Commissioned Corps Memorandums of Agreement (MOAs)

Any or all PHS Commissioned Corps officers "currently serving the program to be contracted" may be requested by tribal contractors and assigned to them by DHHS using a two-party agreement called a Memorandum of Agreement, or MOA. The two parties are the tribe and the PHS (in IPAs, there are three parties: IHS, the tribe, and the employee). Like the IPA mechanism for civil service employees, an MOA allows the assignment of a Commissioned Corps officer to a tribal contract program for an unlimited period of time (MOAs are for 2-year periods that may be renewed indefinitely), while the officer remains an employee of PHS/IHS.

In March 1986, there were 146 Commissioned Corps officers assigned to tribal contract programs under MOAs (table 26). Corps officers are particularly valuable to tribal contractors if they are hard to recruit health professionals such as physicians, nurses, pharmacists, and dentists. The personnel guidelines note, "The Commissioned Corps is thus a potential source of reasonably priced scarce talents and professional services for the tribe." Funds for Commissioned Corps salaries and benefits under MOAs remain in the IHS budget and like IPA funds are cited as "in kind" services. Like health professionals assigned to contractors under IPAs, Commissioned Corps assignees also retain their Federal Tort Claims Act coverage.

Non-Federal Outside Staff

In addition to the mechanisms for using Federal employees, described above, tribal contractors may hire non-Federal outside staff for their programs. This category of 638 employees is the most difficult to define in terms of numbers and professional backgrounds. The overall counts of IHS staff presented earlier in this report (e.g., tables 1 and 3) included IPA and MOA employees of tribal contractors, because those individuals remained Federal employees while assigned to the tribes. IHS maintains quarterly lists of former Federal direct hires, IPAs, and MOAs working for tribal contractors (for example, the March 31, 1986 list summarized in table 26); but it does not monitor numbers of non-Federal, outside tribal hires.

Inadequate data reporting on all aspects of tribal contract operations is a serious problem in IHS, particularly since nearly 30 percent of the IHS hospitals and clinics budget is administered through tribal contracts. Although DHHS counsel has ruled that 638 contract programs are extensions of IHS itself, IHS has not required the tribes to participate in its data systems; and as a consequence, most tribes do not report. The result has been a growing loss of data to describe overall IHS program operations, including tribally operated programs. In a policy memorandum of fall 1985, IHS advised that would remedy this situation by incorporating minimum data reporting requirements in all new 638 contracts and in renewals of existing 638 contracts (37). Unfortunately, this policy has not been in effect long enough to provide reliable data on 638 contract staffing, especially non-Federal 638 staff.

The best tribal contract staffing data that could be obtained by this study were collected as part of IHS's first national survey of 638 contracts, fiscal year 1985, recently reported in final draft (106). The survey was conducted by the IHS Office of Health Program Development in Tucson under the supervision of a steering committee of headquarters, area, and tribal health officials. The purpose of the survey was to collect consistent descriptions of IHS contract programs throughout the country, including scope of services, types of staff, utilization, and other funding sources. The survey excluded tribally operated community health representative and freestanding alcoholism programs, as well as contracts for administrative support or tribal management development only, facility construction, special one-time projects, and urban Indian health projects. Responses were obtained from 86.2 percent of the eligible 638 contracts, grants, and Buy Indian contracts identified for the study. Survey instruments were distributed from the area offices to the tribal health programs, completed, returned to area office staff for editing, and then submitted to project staff in Tucson.

Tribal health program data reporting in this survey was voluntary and self-administered, which has raised concerns about the quality of the data. Despite substantial followup and editing activities, project staff felt that definitions and reporting instructions were not followed consistently. This was a particular problem in the data on tribal staffing: some programs reported numbers of IHS staff assigned to them under IPAS and MOAs separately from their direct hire staff, while others did not, and project staff were unable to determine just how each program had reported its staff. Thus it is not possible to identify non-Federal staff hired by the tribal contractors with confidence. Given that community health representatives, alcoholism, and other projects were excluded from the survey, and that 638 and Buy Indian contracts (plus grants) were combined, the resulting data cannot be compared with IHS's counts of IPA, MOA, and former Federal direct hire employees of 638 contractors.

The survey obtained descriptive profiles from 150 of the 174 eligible tribal health programs. The largest numbers of contract programs were in the Alaska, Nashville, Bemidji, and Aberdeen IHS areas. The 150 health systems were involved in 232 contracts with IHS; 90 percent of the contracts were under Public Law 93-638; 76 percent of them had been funded for 6 years or more. Only six tribal health systems in the survey were direct providers of inpatient services in fiscal year 1985. The 150 tribal health systems reported 5,184 full-time equivalent staff providing inpatient, outpatient, dental, community health services, administration, and support services (table 27). Nearly 60 percent of all tribal program staff were involved in community health services, even though the survey specifically excluded community health representative and alcoholism contracts. At the end of fiscal year 1985, the IHS Office of Tribal Activities reported 251 Federal direct hires, IPAs, and MOAs working in tribal contract programs (from the same source as the March 31, 1986 listing cited above). Depending on how the 150 survey respondents reported their staff, these 251 employees may or may not have been included in the 5,184 tribal health employees.

PROBLEMS IN STAFFING TRIBAL HEALTH PROGRAMS

When tribes assume management of IHS health programs under provisions of the Self-Determination Act, they take on responsibility for personnel management along with other aspects of program operations. IHS remains the primary source of funding for the tribally operated programs, however, and continues to be responsible for ensuring the delivery

Table 27.--Numbers of Tribal Health System Personnel (Full-Time Equivalents, FTE)[1]
By Type of Service and IHS Area, Fiscal Year 1985

	FTEs by Type of Service					
IHS Areas	All Services	Inpatient/ Outpatient	Dental	Community	Administration and Other Support	Number of Tribal Health Systems Reporting (of eligible)
Aberdeen	543.7	70.9	19.5	0.0	72.0	16 (17)
Alaska	1,127.0	453.2	76.0	407.4	190.4	18 (18)
Albuquerque	47.4	16.2	3.8	20.4	7.0	2 (3)
Bemidji	752.0	110.8	32.0	449.6	159.6	29 (29)
Billings	309.0	33.0	10.0	233.0	33.0	7 (7)
California	301.1	68.3	33.6	112.4	86.8	13 (26)
Nashville	537.0	144.1	26.4	208.6	157.9	16 (16)
Navajo	375.0	2.7	2.5	364.8	5.0	3 (3)
Oklahoma	379.4	105.4	14.3	246.4	13.3	5 (8)
Phoenix	345.5	62.3	2.6	243.7	36.9	17 (23)
Portland	346.9	40.5	14.4	262.1	29.9	22 (22)
Tucson	120.0	10.0	0.0	102.0	8.0	2 (2)
IHS Total	5,184.0	1,117.4	235.1	3,031.7	799.8	150 (174)

[1] These FTEs are rounded to the first decimal. They include some Federal staff employed through Intergovernmental Personnel Act agreements (IPAs) and Memorandums of Agreement (MOAs) during the period 10/1/84 through 09/30/85; and they exclude staff of IHS direct operations and volunteers, regardless of funding source. In addition to the 5,184 FTEs reported here by 150 of the 174 tribal health systems included in the survey, tribal contractors reported 1,077 employees of tribally operated alcohol programs and 1,455 employees of tribally operated community health representative (CHR) programs.

SOURCE: U.S. DHHS, PHS, HRSA, IHS Office of Health Program Development, Division of Health Services Systems Development, "Draft Final Report: Descriptive Analysis of Tribal Health Systems, October 1, 1984 - September 30, 1985", Tucson, AZ, August 1986.

of services. In this role, IHS and its area office staff provide technical assistance, as needed, to tribal contract managers. The IHS physician recruiting program and the nursing services branch, for example, will work with tribal contractors upon request to help recruit the staff they need.

The Self-Determination Act was designed to provide tribal contractors with a range of options for staffing their programs, and in most cases this has worked well. As discussed above, the IPA and MOA options are particularly attractive means of obtaining medical staff, because the health professionals retain their Federal malpractice coverage. If they prefer, tribes may hire former Federal employees (with or without retention of Federal benefits, excluding malpractice insurance) or entirely new, non-Federal staff. Given these alternatives, most tribal contractors have been able to develop staffing plans that meet their own needs and priorities, and that allow a smooth transition from IHS to tribal delivery of health services.

These options have not solved staffing problems for all tribal contractors, however. The Self-Determination Act provided for the transfer to tribal management of existing IHS functions; in areas where IHS does not provide direct services, there have been problems. California is the only IHS area that has never had any IHS direct care delivery, and so it is in California that tribal 638 contractors have had difficulty in using the IPA and MOA staffing options. Technically, any 638 contractor, including the California programs, can request assignment of Commissioned Corps officers under MOA and assignment of civil servants by IPA. The Director of IHS has the authority to make such assignments; but this is difficult to do when staff was not previously assigned to an area, because it would mean taking the staff from programs in other IHS areas. Tribal contractors in the Bemidji and Nashville areas are affected to a lesser extent than those in California, because there still are IHS direct care programs in those areas. IHS staff thus can be assigned to those areas and, potentially, to the tribal contractors taking over IHS functions there.

When tribal contractors are unable to transfer Federal staff to their programs, they have to hire staff from other sources. In addition to the difficulties of recruiting health professionals to isolated rural sites, shared with other IHS programs whether run by IHS or tribes, in such cases the amount of the tribal contractor's budget, indirect costs, and the retention of third-party reimbursements become especially important. Many tribal contractors have felt an increasing financial squeeze. Salary and benefits costs may increase more rapidly than the 638 contract awards, but it is the cost of liability insurance that has been the most serious factor.

The liability problem seems to be most severe in California, where some tribally operated clinics have been unable to get malpractice coverage at any price. The director of one California tribal health program reported in summer 1986 that all the California projects were affected by liability problems to varying degrees. A clinic in San Diego had closed at least temporarily due to loss of coverage, and another clinic operated for 8 months without coverage, which finally was granted retroactively (70). Most California Indian health projects agreed that extending Federal Tort Claims Act coverage to 638 contract employees was the best immediate solution to their liability problems; but an amendment that would have done that failed in the 99th Congress.

In another approach to easing tribal contractors' recruiting and malpractice insurance problems, some California projects have made a special request to IHS for the assignment of Commissioned Corps officers under MOAs. It appears this may be done on a demonstration basis. Policies to date have been against it: the 638 personnel guidelines state that a Corps officer cannot be assigned to a tribe unless the officer already filled a position in that area. In addition, there are concerns that the California area office might not be able to find alternate placements for the Corp officers, should tribal contractors no longer require their services. Nonetheless, it appears there are no statutory or regulatory prohibitions against such assignments.

The adequacy of IHS funding for the administrative and indirect costs tribal contractors incur in managing their programs has been debated for years. In spring 1986, IHS announced it was considering payment of documented indirect costs up to 14 percent of the

638 contract award. Meanwhile, IHS has worked to develop external standards of appropriate indirect costs, as well as historical rates of indirect costs in past IHS contracts. A compromise approach was applied in 1986, and a final formula for indirect costs in 638 contract budgets has not yet been determined (113).

Another matter of significant financial concern to tribal contractors involves the proposed application of new resource allocation methods to 638 contract budget determinations, which will affect funding for contract staff. One factor in the resource allocation formula deals with reimbursements collected from third-party payers (Medicare, Medicaid, and private insurance). IHS originally proposed that 90 percent of those collections be considered as available resources in the formula, against estimated resource needs, thus reducing "need" in a manner that could reduce the budget allocation. This is a major issue between IHS and its tribal contractors because in the past, third-party collections were not included as program resources. In summer 1986, IHS compromised by agreeing to count only 75 percent of collections as resources for those programs that met certain collection targets (113). Tribal contractors are much more reliant on third-party collections (which help cover operating costs and provide the ability to expand services) than are IHS direct care programs, and so have been more active in making these collections. The offset proposal would eliminate incentives to collect from third parties, the contractors argue, and the net effect could be to reduce outside (and total) funding for Indian health services.

Tribal organizations in the Nashville and California IHS areas have reported increasing difficulty of recruiting obligated National Health Service Corps (NHSC) physicians. Federally recognized tribes as defined in section 4 (d) of the Indian Health Care Improvement Act are automatically designated health manpower shortage area (HMSA) populations and are eligible to receive NHSC physicians. Indian groups that do not fit that definition also may be designated as eligible for NHSC physicians, but they are eligible only in competition with other Indian and non-Indian HMSAs. In recent years, a more restrictive HMSA Placement Opportunity List has been selected from all HMSAs as priority sites for NHSC physician placement. Some tribally operated programs failed to make this priority list, and so lost NHSC physicians.

Some of the California Indian health projects lost NHSC physicians for this reason (e.g., Trinidad), and the Passamaquoddy tribal clinic in Maine cited the NHSC policy change as an obstacle to their physician recruitment. In letters to congressmen, Passamaquoddy tribal officials stated that because of the historical and trust relationship of the Federal Government with Indian tribes, tribal contractors should take priority over non-Indian health programs in the allocation of NHSC physicians. In 1986, this matter had not been resolved to the tribe's satisfaction (53).

In view of the declining numbers of NHSC physicians, it is unlikely that more of them will become available to tribal contractors in the future. The surplus of physicians nationally and their increasing diffusion into counties beyond the metropolitan areas, however, should benefit most the sites that are nearest to metropolitan areas, including perhaps some of the tribal contractor sites that lost priority status among health manpower shortage areas. These locations may be capable of attracting physicians on their own. One California tribal health board, when it lost eligibility for a NHSC physician, sent a nurse practitioner to visit all the medical residency programs in the State. From among nearly 200 applications, the contractor interviewed 8 family practice physicians and hired the one they needed (70).

The IHS physician recruiting office includes tribal programs and urban Indian health projects in its listings of available positions, when the programs notify the office of their needs. According to IHS recruiters, requests for assistance from 638 and urban programs have been increasing. In the view of IHS recruiters, however, hiring physicians and other clinical staff for 638 contract programs is more difficult than hiring for IHS programs, because each tribal program is unique and thus it is more difficult for the recruiters to know each program well. In some cases, the instability of tribal governments (tribal chairmen serve terms of only 2 years), and the effects of this instability on staffing in tribally operated health programs, can discourage prospective applicants. In the Talihina (Oklahoma) 638 program, for example, a new tribal chairman fired the service unit director and finance officer, causing physicians who had agreed to serve in that program to have second thoughts (20). IHS recruiters report that it also is difficult to recruit staff for small tribal contract programs that offer a limited range of services, are not affiliated with a hospital, and are geographically isolated, such as some of those in California.

Data limitations make it difficult to assess the adequacy of clinical staffing in tribally operated health programs and to determine current unmet staffing needs. Overall counts of IHS staff include Federal civil service and PHS Commissioned Corps officers who are assigned to 638 contract programs. The numbers of former Federal employees who resigned to accept employment with tribal contractors also are monitored by IHS. But in spite of a special survey of tribal health programs conducted in 1985-86 by the IHS Office of Health Program Development, the numbers of non-Federal employees staffing those programs remain unclear. Are tribal contract programs overstaffed, or inappropriately staffed for health service delivery? Some IHS and area office officials believe tribes may increase employment in 638 contract programs beyond what is necessary for efficient service delivery, in order to provide needed jobs for tribal members. Is too much funding put into support staff, and related social services, instead of staff for clinical services? Do tribal health boards absorb funds for administrative and tribal government purposes that could better be devoted to health care? Such possibilities have been suggested, but are difficult to test given available data and reporting systems.

The need to include tribal contractors in IHS data reporting systems has been noted before, and the present IHS policy of requiring minimum data reporting in all new 638 contracts and in contract renewals needs to be implemented as quickly as possible. The experience of the Office of Health Program Development's special study team suggests that some tribal contractors are not strong in data collection and reporting, and IHS could ensure that they receive the technical assistance they need to report comparable, consistent data to IHS systems. The IHS physician recruiting office could make special efforts to include tribal contract programs in its proposed recruiting data system, so that the programs could benefit from IHS efforts to recruit volunteer physicians and other clinical staff.

In summary, the available means of assigning on-site IHS employees to staff tribal contract programs, as provided in Public Law 93-638, are advantageous to tribes taking over operation of existing IHS programs. Some additional provisions could be made to facilitate staff recruiting and management for all tribal contractors, including those that have not been able to use transferred Federal employees. Appropriate administrative and indirect costs need to be provided for all 638 contractors, and the liability coverage problem must be resolved. Congress could reintroduce legislation on these issues that failed in the 99th Congress, that is, H.R. 4174, which dealt with indirect costs, and revised appropriations language to extend Federal Tort Claims Act coverage to tribal employees hired specifically to carry out contracted IHS functions (but not all tribal employees hired for any purpose). If as IHS counsel has advised tribally operated programs legally are extensions of IHS itself, the need to provide liability coverage for tribal programs is inescapable. IHS could continue its work with 638 contractors to manage the problems that exist, whether or not there is congressional action.

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